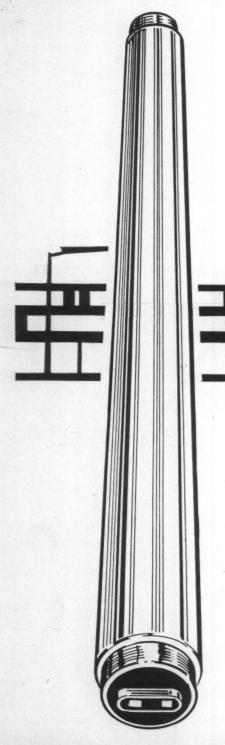
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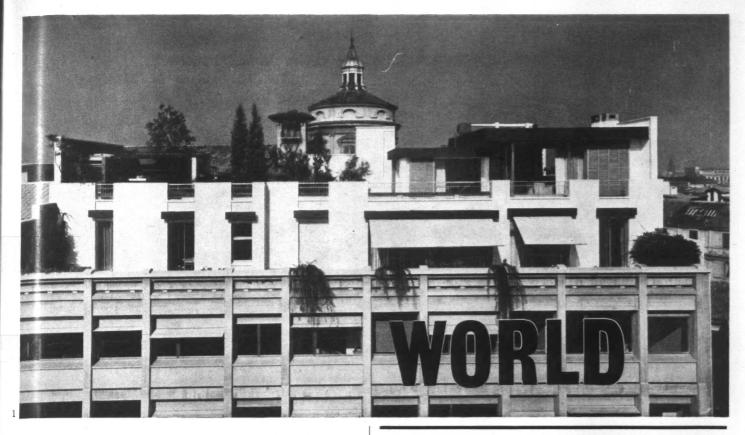
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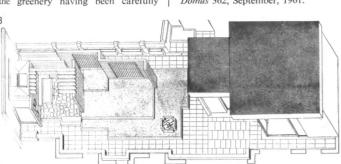


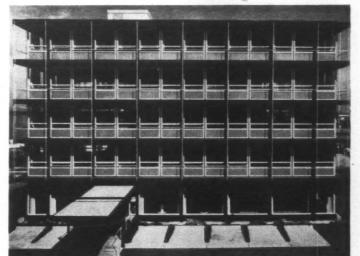
# **ROOMS AT THE TOP**

Penthouse Milan should be one of the holy places of affluent Europe, a network of fabulous rooms at the top (with sun-terraces, of course) on the summits of forty years of high-rise development. By now, there must be enough of them to make the subject of one of Hoepli's Esempi booksindeed, Hoepli have something of a duty in the field, since one of the most recent and distinguished, 1, designed by Figini and Pollini, crowns the top of the Hoepli office block, 2. The rather surprising dome is, needless to say, no part of the penthouse, but is an essential part of that roofscape of spires, trees, campanili and baroque extravaganzas whose existence is one of the prime justifications of the penthouse world, much as the scenery of the Alps justifies the villas on the lakes. In this case, as will be seen, the penthouse makes its own contribution to Milano verde, with an extensive programme of planting on the upper terrace, 3, the seasonal variations of the greenery having been carefully



studied by the architects to avoid blank months, and their detailed planting programme can be found in *Domus* 362, September, 1961.





# EIERMANN TODAY

Egon Eiermann's place as a legend of post-war European architecture seems assured, but what is he doing? Apart from his much-argued memorial church in West Berlin, which will be illustrated in due course, Eiermann is still doing what might be expected-Deutsche Bauzeitung (9, 1961) and Bauwelt (39, 1961) illustrate new office blocks for industrial concerns, and chain stores for Merkur. But there are some surprises among this recent output. Not in the office-block he has recently completed in Oldenburg, 4, with its serene two-over-one rhythm of façade panels, and its fine-drawn detailing, 5, for hand-rails and sun-



#### ACKNOWLEDGMENTS

COVER: Ara Güler. WORLD, pages 369-372: 1-3, Domus; 4, 5, Bauwelt; 6-9, Deutsche Bauzeitung; 10, Maris/Ezra Stoller Associates; 16, 17, Zodiac. VIEWS AND REVIEWS, pages 373–375: 1, Galwey Arphot. FRONTISPIECE, page 376: James Mortimer. THE FARMHOUSE, VERNACULAR AND AFTER, pages 377-379: 1, 2, M. W. Barley. CHEMISTRY BUILDINGS, LEICESTER UNIVERSITY, pages 380-386: 1, Toomey Arphot; 2-15, Galwey Arphot. GENTLE, NOT GENTEEL, pages 387-393: 1-18, 20, 25-28, 33-35, Nairn Arphot; 19, Peter Pitt; 22, John R. Pantlin; 23, A. C. K. Ware; 24, 29, Toomey Arphot; 30, 32, Galwey Arphot; 31 Fox Photos. Exploring Eye, pages 399-401: Ara Güler. CRITICISM, pages 402-410: 4, 6, 8, 15, 16, Galwey Arphot; 1, Toomey Arphot; 2, 13, Arthur Winter; 3, John Piper; 5, 7, 10-12, 14, Banham Arphot. ID, pages 411-415: 5-10, John Maltby. DR, page 416: Banham Arphot. GARAGE AT LONGBRIDGE, pages 419-420: Toomey Arphot. GARAGE AT ALDERS-GATE, pages 420-421:1,3, Toomey Arphot; 2, Herbert K. Nolan. GARAGE AT SOUTH-WARK BRIDGE, pages 422-423: 1, 3, 4, Hodgkinson Partners; 2, 5, Banham Arphot. GARAGE AT LEYTON, page 424: John Maltby. Miscellany, pages 425-433: Exhibitions, 5-8, R. B. Fleming. Townscape, 1, Toomey Arphot; 2-10, Nairn Arphot. Plants, 1, Toomey Arphot; 2, 3, J. E. Downward; 4, Tania Stanham. Credit, Galwey Arphot. SKILL, pages 434-440: 4, 8, Cement and Concrete Association; 12-15, 18, Rural Industries Bureau.



On the cover, Ara Güler's striking evocation of the Romantic agony of a great classical ruin calls attention to the uncertain future of a little known archaeological site of the greatest interest, Aphrodisias in Asia Minor. For centuries it has lain in picturesque disarray, but now a US archaeological team is to undertake a major excavation there. Just what will be lost in the process of excavating and tidying-up is forcefully brought out in further photographs by Ara Güler on pages 399-401.

#### THE ARCHITECTURAL REVIEW

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369 World

Views and Reviews 373

Frontispiece 376

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Miscellany: Exhibitions

Townscape

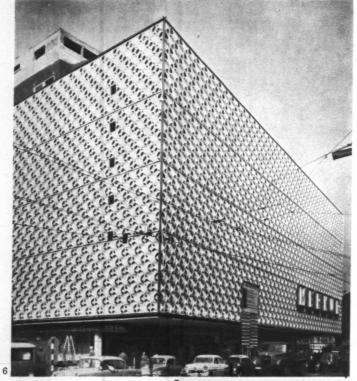
Plants

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Walls, Fences and Gates: Robert Haynes

440 The Industry

Contractors, etc.



#### Eiermann

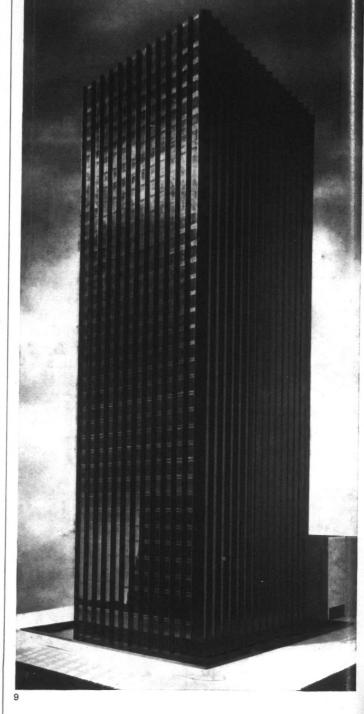
blind steadies-this is the Eiermann of the Blumberg factory and the early work for Kaufhaus Merkur, the Eiermann of the legend.

But his recent work for Merkur may well startle his admirers. At Stuttgart, for instance, not only does Eiermann's shop enjoy the invidious prominence of occupying the site of Mendelsohn's Schocken store, but its exterior, 6, is entirely clothed in what appears to be Ed Stone-work. Eiermann's attitude to the Schocken-Skandal is not known, though many of his supporters feel that he should have declined to build on the site, but in the matter of the external grillework he is the victim of the new Merkur house style. Rumour traces the origins of this laced-over brandimage to a desperate visual rescue operation (not by Eiermann or any of his partners) on the Kaufhaus Merkur in Duisburg, 7, where the filigree is supposed to be a cover for



an unsatisfactory façade. Comparison of the two buildings will at least show that a great architect can make more of a poor brand-image than anyone else, and in Heidelberg, 8, using a different grille-unit more frankly expressed as a screen, Eiermann shows that given time he may even be able to make major architecture out of it





# THE LAST SAARINEN

The CBS Building, 9, to the north of Rockefeller Centre, will be the answer to 'Now let's see what he does to a skyscraper' (much heard in New York this year) for this will be Eero Saarinen's first essay at a tall office block, as well as his last completed design. The tower will have four identical faces, sheer for thirty-eight storeys (one need hardly point out that Lever, Seagram and Union Carbide are only sheer on the sides that are exposed to public gaze-if

that). The facing material will be dark grey granite which suggests an aspect even more monumental than that of the Seagram, and this effect should be heightened by the fact that the building stands back from the property line on all four sides, and is sunk slightly below the level of the vast piazza that will result. Perhaps the most sensational statement in the preliminary handout from CBS is that the frame is to be of reinforced concrete.



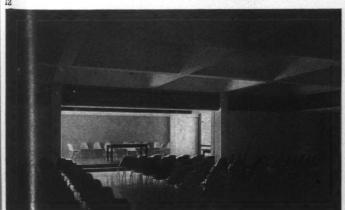
# KLING AT QUITO

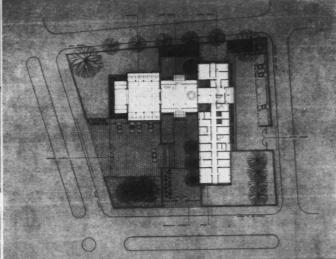
Notwithstanding superficial impressions to the contrary, the Foreign Buildings Operations of the US State Department is not entirely committed to the famous name and the knock-out gesture. Vincent Kling's new embassy in Quito, Ecuador, 10, recalls the modest and entirely praiseworthy beginnings of that programme, in its ability to be suitably ceremonial without being pretentious, and its air of undistracted functionalism. For once, the State Department neurosis about respecting local traditions seems to have come to the architect's assistance, not hindrance-earthquake protection is the primary consideration, perimeter walls around sites are more or less mandatory, and in this case have absorbed most of the 'local materials' on which FBO policy seems so fixed.

The embassy consists of three parts, clearly identifiable in 10; a portico or covered entrance-way, connecting a small lecture-auditorium on one side, and an office block on the other, and the plan shows, 11, a modicum of bi-axial symmetry governing the composition of the three elements. The

auditorium, under its cluster sixteen concrete 'monitors' (echoing the forms of local housing) is a gratifying simple room, 12, which makes effective use of natural side-lighting to illuminate the stage. The office block, which is of quake-proof reinforced concrete frame construction, has the kind of cellular interior planning that might be expected, clearly expressed on the façade, 13, where the windows are partly screened by pot-tile lattices, the opening lights at either side being left unscreened. The interiors are businesslike, as exemplified by the library, 14 (in which readers will observe Sweet's catalogue prominently shelved). The city council of Quito have recognized the merit of Kling's design by awarding it their Gold Medal as the 'best private building for public service' erected in 1960, but the embassy is a work of such distinction that it deserves wider recognition.













# SPAETH HOUSE

The occasional round-ups of the architectural situation in a particular nation undertaken by Zodiac have a knack of turning up odd buildings (literally odd) that everybody else seems to have missed. Zodiac 8 did precisely this thing in its survey of America for there, among the betterknown designs of George Nelson, was a startling piece of Stanford White revival. Not only does Nelson's Spaeth House, 15, on Long Island have the wide-span gable of White's Low House at Bristol, R.I., but the wavy eyebrows over the windows of the tile hung façade, 16, keep alive a dormer tradition that was the common stock in trade of romantic Anglo-Saxon architecture around the turn of the century. Whether the same sort of

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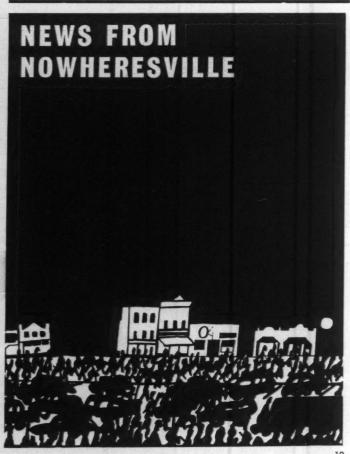
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#### Spaeth

thing could be said of the plan, 17, is another question—while the outward trappings of picturesque architecture have changed or been abandoned, its planning tradition, the open plan, goes straight from Edward Prior's Home Place to Amyas Connell's

High and Over, from The Robie House to the Gropius and Breuer cottage at Wayland, Mass. Italian critics have often insisted that all that is wrong Neoliberty is that it revives the forms of Art Nouveau without its structural sense—could it be that it's real trouble is that it stifles a planning tradition that never needed revival?



The text of the two-part publication of 'Steinberg on the City' in Journal of the American Institute of Planners, brackets him with Reismann, Veblen and Mencken as a 'voice of our collective conscience,' but what one notices about many of the drawings published in this issue (August, 1961) is that, among familiar ruderies at the expense of the American scene, are a number of drawings, such as 18, that suggest he is moving almost into the affectionate, if not respectful, mood of illuminated description that marks Edward Hopper's paintings or Shahn's topographical pieces. The old savagery still flashes out, cars are seen as a beetling plague, 19, their fumes as a personal affront, and public transport as a descent into a hell of mannerist perspective. But in addition to the conventional in-



vectives on suburbia as a tundra of industrial swarf, television aerials and the backsides of neon signs, there is also the ideal suburbia of Victorian America, taken straight, 20, and one view of the main drag of Nowheresville, 21, that simply says, with luminous clarity and profound understanding, 'this is how it is.' Can it be, quite simply, that America finally

subdues even her adopted sons, or is it that the world in general is discovering virtues in the American scene where only vices could be discerned before?

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## views and reviews

#### ARGINALIA

#### SIXTH BIENAL, SAO PAULO

B itain's first official architectural representation at the Sao Paulo Bienal was rewarded with three honourable metions, awarded to: Sheffield Universy Library, by Gollins, Melvin, Wall and Partners; Stevenage Town Cenre, by L. G. Vincent; and Alton Estate, Roehampton, by the LCC Architect's Department.

The grand prize in architecture was awarded to the Brazilian architects Paulo Mendes da Rocha and Joao de Gennaro, and the second prize to Jacques Schader.

#### A HOLE IN THE TOWNSCAPE

London Transport's experimental Routemaster bus, naked in its unpainted aluminium panelling, is an innovation that can hardly be welcomed. At present it is only a solitary grey ghost, a hole in the townscape where a red bus ought to be, but the prospect of a general changeover to unpainted buses would be a sad change in the London scene. Irrespective of whether or not the bus looks all right in itself (it does not; either the material, or the method of manufacture, results in an unpleasant and scratchy surface) it does not look all right in the London scene—the traditional red of the buses is as much part of the tourists' London as the lights of Piccadilly or Buckingham Palace, and as much part of the Townscapers' London as the Regency bollards or Edward Johnston's 'UndergrounD' sanserif lettering. To lose these splendid blocks of strong colour would be an irreplaceable visual loss, whose compensation in terms of money saved by London Transport is extremely uncertain. Indeed, the cost of applying the paint of the buses is only £40 per vehicle, while it is not yet known how much extra maintenance the unprotected aluminium will require. Even if it required none at all the extra forty pounds would still be money well spent on London's morale and esprit de ville.

#### DOVER FORTIFICATIONS

The slow-motion saga of the spoliation of the Western Heights fortifica-Dover (AR, March, 1959, Marginalia, February, 1960), seems likely to move a little nearer to ultimate banality if plans currently hein hatched by Dover Corporation and the War Office are allowed to come to anything. Some of the reclamation proposals of the Corporation seem entiry praiseworthy, such as the Dros on of flats and space for light industry-the views should be of to the former, while there is of cover for the latter if intellisited

But it is also proposed to gut the Grand Shaft, 1, and replace its famous

spiral staircase with a lift-a piece of twisted pseudo-humanitarianism if ever there was. It is essential that the Western Heights be redeveloped in such a way that the Grand Shaft remain a tourist attraction, since it is doubtful if it could ever provide enough vertical transportation to serve a 'huge block of flats,' and it should be relieved of this function completely. If it is not to remain, suitably restored, as a monument of early nineteenth-century military engineering, there is little point in keeping it at all. The present proposal sounds like 'improvement' for improvement's sake.

But another proposal is so thoughtless as to defy belief-to use the moats as public rubbish tips! Not only would this proposal render the area unsavoury to the proposed flat-dwellers and destroy all conceivable attractions of the ninety-six acres of hillside intended to be preserved as open spaces, but it would effectively obliterate the genius loci, and the eventual disappearance of the moats would destroy the little surviving visual evidence of what was once the greatest fortress in Europe. It is depressing to note that local mouthpieces, while observing with satisfaction that in acquiring the site they would acquire two ancient monuments-the Bredenstone pharos and the ruins of the Templar church -seem to have completely failed to observe that the site itself is a monument in its entirety, and deserves to be treated as such.

#### THE BALANCE OF SCIENCE

It is not often that an entire mental discipline, a whole world-wide body of thought and action has cause to feel that, like a walk-on player in a play, it has not had its fair share of the reviews. Nevertheless, building science may well feel that it has ground to complain of the treatment it receives in the new UN/UNESCO publication *Current Trends in Scientific Research* (HMSO, 33s.). The attempt, by Pierre

Auger, to survey the direction and pace of science today, in one volume of less than 250 pages, must command our basic respect, but leaves the reader at liberty to ask what sort of balance between the various parts of science (including the higher technology) one man can ever hope to strike. First of all, this survey only covers the 'natural sciences,' and therefore (?) excludes psychology, sociology and the human sciences generally, except medicine. Its view of building research consistently follows this line and excludes all architectural and planning considerations except those that are directly derived from physiology (acoustics and comfort-level studies). This may be fair enough, given the narrow approach, but prefabrication, for instance, gets three lines, stunningly un-informative and rather misleading, thus 'A great deal of work is being done in various countries on the prefabrication of industrial buildings, i.e. buildings comprising components of a very large size.' (This must be the most meaningless id est in recent literature.)

In view of the massive importance of prefabrication research in most of the major building countries of the world, it is interesting to compare this three-line entry with fourteen lines on Externally Perturbed Atoms, or-to take an example from a field more directly comparable with building—seventeen on automobile braking. One observes that the Building Research Station was among the authorities consulted in compiling the bookthey cannot have given a very forceful account of themselves for such a disproportion to have resulted. Or, alternatively, Professor Auger (described in the UNESCO handout as 'a very un-Herculean figure, a slender and almost frail scientist, whose shyness belies his world renown') may have had to make hurried value judgments out of an unmanageable welter of information, and allowed himself to be somewhat influenced by the fact that he is a physicist. At all events,

it is no excuse for UNESCO to say that the book is 'neither a panorama nor an encyclopaedia'... When a book is as unique in its field as this, it will be used as an encyclopaedia in default of a more balanced work.

#### REISSUES AND PREISSUES

The spate of paperback issues of architectural books continues-but not all are re-issues of established hard-cover classics. J. M. Richards, for example, has followed Dr. Pevsner in moving in the opposite direction, and his Introduction to Modern Architecture, as well as being available as a paperback in English, Spanish, Portuguese, Serbo-Croat, Italian, Dutch and Japanese, is now available also as a hard-cover volume in English (one of Cassells' new Belle Sauvage Library, 21s.). Again, Jean Gimpel's The Cathedral Builders is available in English (in Carl F. Barnes's translation) only as a paperback (Evergreen/ Profile Books, 6s.). It is an extremely useful addition to the available literature on Gothic architecture, since its scholarship is tempered by a degree of readability that should attract, not dismay, the general reader, its illustrations are adequate for the price, and its selected subject-the men who financed, organized, designed and constructed the great mediaeval cathedrals—is not one that has been covered in a compact tome before.

A paperback re-issue in (literally) the classic mould, is Geoffrey Scott's The Architecture of Humanism, now available in a facsimile reprint (or possibly a stereo from the original type) at 8s. 6d. (Methuen/University Paperback). The academic ethics of such facsimile reprints are always dubious when they offer a work that is not of our own time-uneasiness has been expressed, in these columns and elsewhere, at reprints of Vitruvius, Viollet-le-Duc, and others, without the benefit of modern notes, glosses, or introduction. Geoffrey Scott totters on the brink of historyto two generations he is an authority, but to another he is already a fuddyduddy. 'Who was Cecil Pinsent?' they demand, glaring at the dedication, and little expecting to hear that their question should have been phrased in the present tense. To have put Geoffrey Scott in his historical context, somewhere between the Ritz and I Tatti, so to speak, would have been a public service by the publishers, and would have put present arguments about 'the last of the old-style classicists' on a firmer foundation.



1, the Grand Shaft at Dover

#### CORRESPONDENCE

#### RUSSELL SQUARE

To the Editors.

SIRS,—I have read with interest the letter from Mr. P. G. Hall in your October issue, suggesting that this Council has been responsible for the 'desecration' of Russell Square garden. Mr. Hall contends that Repton's original eighteenth-century scheme was designed to 'bring the country into the heart of the town.' Repton himself in writing specifically about Russell Square says that 'It is possible that some fanciful advocates for natural gardening will object to this dis-

#### views and reviews

position of the trees as too formal. . . . In the due attention to the training and trimming such trees by art, consists the difference between a garden and a park, or forest; and no one will, I trust, contend that a public square should affect to imitate the latter.' Incidentally, Repton also expresses a principle in describing his design that it was '. . . founded on a due consideration of utility as well as beauty, without bigoted adherence to forms and lines, whether straight, or crooked, or serpentine.

Whilst appreciating Mr. Hall's feelings for the preservation of links with the past, I would suggest that the treatment of a garden presents special problems, consisting as it does mainly of growing natural elements, and it would be difficult to sustain the argument that for over a century and a half the 'character' of the garden had not changed. Changes have been brought about by quite unpredictable forces; for instance, during the last war when the perimeter railings were removed, the garden became truly public for the first time, although the original intention was for a square primarily for the benefit of the residents occupying the houses round it.

Holborn Borough Council, as administrator of the garden since the war, has seen its duty as one of adapting the character of the garden to the wider needs of the whole residential and working population of the area, not forgetting the numerous visitors, and although the final phase of the scheme has yet to be completed, it will be seen that there is at least an equivalent area of grass. Mr. Hall is anxious to preserve what he describes as a lost spaciousness, loneliness, freedom, but maybe these characteristics could only be equated with the use of the square by the few as against great numbers of the general public that have shown their appreciation of the present scheme in the most practical way-by its use.

Yours, etc., C. F. Burge (Chairman, Highways and Works Committee, Holborn Borough Council).

#### PORTSDOWN HILL, HAMPSHIRE

To the Editors.

Sirs,-In spite of the fact that a green belt area has now been approved for Hampshire, much of what Mr. Ian Nairn predicted in his excellent article 'Green Mantle' printed in THE ARCHITECTURAL REVIEW for November, 1959, seems unfortunately to be coming to pass. He referred to the Portsdown Hill Area and Southwick, and I would like to suggest for the following reasons the formation of a Trust or Society not only with the object of preserving the landscape of this important area but also to help reinstate those areas which have become neglected and are now largely overgrown with scrub. Some pleasant northern slopes have already been officially omitted from the green belt area and those between Bedhampton and Waterlooville have been suggested for possible residential development as this part of the hill has been termed 'uneconomic' by the local authority concerned.

The Portsmouth City Council are still pressing for their boundary extension, and although Southwick has been included in the green belt pressure is being brought on the Ministry of Housing and Local Government to release this pleasant village for residential and industrial development. The logical solution to the Portsmouth overspill problem, the construction of a bridge across the Langstone Channel to South Hayling and the creation of a new community with both residential and industrial development in that area, has been turned down by the local powers that be, because of the cost of the bridge, between four and five million pounds. This sum is not seen as an investment in what could be a new resort to form an incentive for someone to restore decaying areas of Southsea. Although many of the southern slopes of Portsdown Hill have largely been ruined by local authority housing, and the crest has been invaded by the Admiralty, sufficient remains of this large open space accessible to well over 200,000 persons to enable the environments to be improved.

Not only could the northern slopes, in constant pressure from the Waterlooville 'sprawl,' be preserved, but much of the land on the southern slopes could be restored. A Society or Trust could for example be empowered to buy land, plant trees, to form shelter belts, spinnies or screens and help to clear scrub and suggest where necessary landscaping could be improved.

It may be argued that such a problem is a local one and therefore of little concern to Review readers, but surely a hill of this nature is as important as the Lickey Hills, Hampstead Heath, the South Downs near Brighton or the Solent area. I would be grateful therefore of readers' views concerning this area and would like to know if it is thought that a stand could be made for its preservation at national level.

Yours, etc., DONALD S. DAWSON. Portsmouth, Hants.

#### **BOOK REVIEWS**

#### **EXHIBITIONS SURVEY**

EXHIBITIONS. By Klaus Franck. Architectural Press. 73s. 6d.

This can only be described as a really posh job. It is a survey of international designs for exhibitions, large and small, fixed and mobile. There are 130 examples gathered from 16 countries. There are 250 pictures, a text in two languages, an introductory article on problems and principles and a list of designers' addresses at the end.

Conscientiously selected, elegantly laid out, primly printed, precisely described-only the sourest reader could ask for more. Yet note, if you will, those adverbs. Is the throat caught? Does the eyelid prick or the heart leap? Frankly no. (Whose mouth, after all, ever waters over an immaculately turned-out and frozenfaced fashion-plate?) Yet facts-however glossily presented-must be faced and it is sadly symptomatic of the elegantly tailored culotte-de-sac into which exhibition design has inserted





2, the northern slopes of Portsdown Hill seen fro m Parbrook Heath, 3, Admiralty housing on the cr of Portsdown, See the letter from Mr. Donald S. Dawson

itself during the last ten years that the reader's first reaction to this handsome compendium may be that he has seen it all before.\*

He hasn't, of course; yet here, still gamely at it on page after page, are the spindly metal legs tittupping rigidly across the polished floors, the enlarged photographs of micro-cells, the 'grot' captions, the space-frames, the multiplicity of light-fittings, the empty silent rooms. (True to formula no live person is ever permitted to disturb by his presence in the photograph the clarity of the designer's conception.) How sinister, in repetition, are these icy rooms-each one, as it were, holding its breath. How one longs to make a mess or a loud noise or write something on the wall. This is exhibition design for exhibition designers' sake. Is it fanciful or professionally disloyal to detect beneath it all the built-in dislike of every architect for the object he is supposed to display, his inborn lifelong never-to-be-admitted irritation with People? Perhaps it's time now that the painters had a go. They are no less arrogant, but some of them have hearts as well as heads. Think of a furniture-stand by, say, William Scott or Rothko, a chemical display by Kokoschka or Ceri Richards or Roger Hilton-all photographed, in working order, by Roger Mayne. We badly need, in the face of such dead-pan and ingenious architectural competence a nouvelle vague.' Meanwhile it would be ungenerous to look this gift-horse in its shining well-brushed teeth. Here, unquestionably, are the best designs of the last decade—(a few quite outstanding examples by Max Bill, Wirkala, Girard and Castiglioni)-with every one of which any architect anywhere would be proud to have been associated . . . and that's something

\*e.g. Lohse's 'New Exhibition Designs,' 1953, Erlenbach, Zurich, same size, typography and layout, 260 pictures and 3 languages.

you could seldom say of any architectural picture-book.

Hugh Casson

#### ABSTINENT FRIENDS

THE FRIENDS MEETING HOUSE. By Hubert Lidbetter. The Ebor Press. 35s.

The interior furnishing of an early Friends Meeting House in England approximates as closely as anything on this side of the Atlantic to the famous Shaker furniture of America. Not in type, for it consists mostly of permanent seating, galleries and the like, but in a quality of direct functional simplicity that expresses a spiritual aspiration in material substance better than most of the religious 'art' that has silted up the altars of Europe in the last five centuries. For a reasonable parallel one must go back to pre-Quaker and pre-Renaissance com-parisons—the flap-up partitions of the closed galleries at the back of Brant Broughton in Lincolnshire suggest nothing so much as the flap-down work-bench of St. Joseph in van Eyck's Ghent altarpiece, painted some three centuries before Brant Broughton was completed in 1701.

Such discoveries as these (and they will be discoveries to most readers) can only make us regret that Mr. Lidbetter's book should be so inordinately expensive, and so dully illustrated. The under-inked half-tone blocks of uniform half-page format do less than justice to a group of buildings that clearly deserve the love and labour that the author has lavished on them + and none better qualified than he to do so, for he was appointed Surveyor to the Six Weeks Meeting in 1935, designed the present Friends House in the Euston Road, and established I is expertise as the historian of Quaker Architecture with an article in the AR for April 1946. Fortunately his dev >tion shines through the inadequaces of production, and should give many readers an illuminating insight into in

#### views and reviews

'architecture' that seems to anticipate the aims of Lethaby, and lays fair claim to being the spiritual father of the Functional Tradition.

Hugh Wykeham

#### AESTHETIC OR TECHNIC?

- TSURA. Introduction by Walter Gropius, ext by Kenzo Tange, photography by Yasuhiro himoto. Yale University Press (London, 119) \$6. UP). £6.
- STORIA DELL'ARCHITETTURA MOD-RNA. By Leonardo Benevolo. Editori RNA. By Leonardo Benevaterza, two vols., 16,000 lire.

confrontation of a part of the will of the Katsura detached palace, ar l a Mondriaan-victorious confir nation of the eternal beauties reawakened by modern architecture, or sir ply another proof that the Modern Movement cannot tell a technic from an aesthetic? The persistent misreading of the Japanese Sukiya tradition in Mies-Mondriaan terms has been a worrying feature of architectural 'thought' (sic) ever since the war, and Professor Benevolo, who makes the confrontation in the second volume of his compendious history, does himself less than justice in doing so. But has he done an injustice to the Movement whose history he writes? To judge from Walter Gropius's introduction to Ishimoto's rather dim pictures of the Katsura palace (the fault may be in the inking, not the original photographs) Benevolo does no injustice at all, for Gropius, with that complete absence of historical perspective that is at once so exhilarating and so terrifying, is quite happy to read Katsura as a justification of the Werkbund ambitions of 1911. He is 'impressed' by the Zen maxim: 'Develop an infallible technique, and then place yourself at the mercy of inspiration' (cf. 'So much for technique!-now what about Beauty?' in The New Architecture and the Bauhaus), by means of which the Japanese have developed 'complete flexibility of exterior and interior walls, changeability and multi-use of spaces, modular co-ordination of all the building parts, and prefabrication. One can still buy . . . standardized component parts of a wooden house and assemble them on the site . . . can satisfy the seemingly self-contradictory requirement of providing unity and diversity' (pure Berlage!) and of course 'The builder subordinated himself to the supra-individual idea of a unified environment . . .' and so on. I suppose it is just possible to imagine a Japanese using a comparable European building (the Petit-Trianon, or Royal Lodge, Windsor) to justify twentieth-century ideas about self-expression, or something. .

Benevolo's book, on the other hand, never really raises the problem of aesthetic/technic confusion in as fundamental and generalized a manner as his subject requires, though there are some passages where he generalizes very acutely from what must have or ginally been purely visual observations—e.g. his parallel drawn between repetitious composition of Duri's ideal projects and the repetitious embly of engineering works such as Crystal Palace. Benevolo, in short, ongs to that tradition that sees the lution of modern architecture as pi marily dependent on social, legislative and industrial causes, rather than on aesthetic (though the general visual culture of successive epochs is briefly sketched in). Where he improves and extends this traditional view is in a literal extension, backwards into time. While most such studies take off from the mid-nineteenth century, Benevolo, in line with a general current interest in Italy in Illuminism, takes off from the French Revolution and casts a backward glance at 1750.

In this, clearly, he follows the logic of the technico-social approach, and I suppose it is only a matter of time before we have histories of modern architecture that take off from the Council of Trent, the Black Death, the Coronation of Charlemagne or the Battle of the Mauriac Plain, Benevolo himself raises the problem of the limits of the subject, but it seems to me that he, like the intense young radical ladies who write for Superfici, has already lost the sense of the modernity of modern architecture, a loss which makes it possible to reflect the past forward on to the present almost as indiscriminately as Gropius reflects the present on to the exotic past.

In saying this, I am probably being unfair to Professor Benevolo, whose choice of take-off point is well argued, and his book as eruditely written as its bulk and scope require. Nevertheless, this current tendency in Italian historiography serves a salutary need in making us ask what we mean by modern, and requiring us to sharpen up our historical definitions. Where, on points of definition, I hold my own basic quarrel with Benevolo is that in the two-hundred year span of his narrative he has only one industrial revolution. English technical and social historians have already abandoned this over-simple position. For a start, the industrial chaos criticized by utopians like William Morris was the product of over a century of mechanization, containing a number of major upheavals, and imparting a social and economic dynamic far more violent than any of the political revolutions of the period. Again, there is-as I have argued elsewhere—a major change in the sense, quality and effects of mechanization in the first fourteen years of the present century. Even if Professor Benevolo is prepared to leave Cubism, de Stijl and other purely formal influences almost completely on one side (twelve pages out of over a thousand) his silence about the revolution wrought by Benz, Diesel, Marconi, Edison, Hertz, Fleming, Pulitzer, Lasker, Ford, the Brothers Wright, and the rest of the makers of the twentieth century, seems doubly inexcusable. Firstly, because one would suppose that his basic position would require him to notice all major socioeconomic upheavals: secondly, because this particular upheaval is the one that accompanied the emergence of 'modern architecture,' as the term used to be understood before expansionist historians began stretching it backwards. Einstein alone (not even Minkowski) gets a showing in Benevolo, out of this whole army of technical and scientific revolutionaries.

The trouble seems to be that the effect of this later socio-economic upheaval was to focus attention more particularly on the individual and his motivations than on the masses and their movements, and this is a field that most historians of modern architecture are extremely reluctant to enter.

Nevertheless, it is a field that must be entered, because it seems to hold more keys to what has been happening to architecture in the last forty years than all the history of the previous hundredand-sixty, whether interpreted in Marxist, paleo-Marxist, neo-Capitalist, pseudo-Positivistic or any of the other terms with which Italian historical philosophers make so free, Benevolo's Storia dell' Architettura may yet prove to be the last, as well as the most comprehensive, of the socially diffuse histories of Modern Architec-

Reyner Banham

#### SWEDISH INTEGRITY

NEW ARCHITECTURE IN SWEDEN.
Compiled by the Association of Swedish
Architects. Stockholm: Almqvist and Wiksell. No price given.

With one reservation one can acclaim this anthology of Swedish buildings of the ten years between 1950 and 1960 as a model of its kind. The 160 or so buildings, grouped according to category, are well chosen-as far as an outsider can judge-beautifully photographed and spaciously laid out, and each has a clearly drawn plan. The reservation is that there is no information whatever beyond the name of the building, its date and the name of the architect. Even a few words of description, giving essential information that cannot be deduced from the photographs-on such subjects as siting, purpose, accommodation, materials and colours-would have made the book ten times more interesting.

Nevertheless, it is an impressive volume and bears out the claim made in a useful introductory text (printed in English as well as Swedish) that although Swedish architecture may not now have the impact internationally it had in the 1930s, that is not because standards have deteriorated. There is still no place like Sweden for consistency and integrity of design, for serious, workmanlike solutions to all kinds of problems and for the craftsmanlike use of materials. In no other place is architecture so clearly one of the guardians of the public conscience.

#### THE BUSINESS OF DESIGN

PROFESSIONAL PRACTICE FOR DE-SIGNERS. By Dorothy Goslett. Published by Batsford. 30s.

One should treat this book like a dose of salts-get it before you need it, read the instructions carefully and then keep it on an office shelf in case of emergency. While being most effective when taken early it can be self-administered with benefit at all times by those anxious to maintain a healthy practice.

Miss Goslett, one of the partners and business manager of Design Research Unit (the biggest industrial design organization outside the United States) writes with fourteen years experience of making the practice of design function as a normal paying business. And it is the merit of this book, very well written in simple and practical terms, that it gives precise advice on how such a practice can be achieved, and what to do if things go wrong.

The book traces the business of industrial design through all its stages. It starts with elementary problems of setting up an office—a section of particular value to anyone commencing his own practice. Small details are not considered to be too unimportant to mention-how to get a telephone installed, registering a business name, having decent tea-cups for clients, and so on. This is followed by a careful assessment of the budget that should be allowed for the first year in practice if there is to be a reasonable chance of remaining solvent at the end of it. The section on 'Finding Clients' is the only one not relevant to the architectthough the ingenious bait-and-tackle advice has a special fascination for anyone fenced in by the Code of Professional Practice.

After a section on taking the client's brief there is sound advice on letter writing with examples of wording appropriate to the most tentative or concrete proposal. There follow chapters dealing with the costing of the job, checking progress, and running the office generally. The book is by far the most practical one of its kind available. The fact that it is written mainly for industrial designers does not detract from its very real value to any architect who may be concerned that his ability as a designer should be helped, not hindered, by his office organization.

Stephen Garrett

#### ROYAL HALL

THE CASTLE OF BERGEN AND THE BISHOP'S PALACE AT KIRKWALL. By W. Douglas Simpson: Aberdeen University Studies. No. 142. Published by Oliver and Boyd 1961. 13s. 6d.

Dr. Simpson, who knows more about castles in Scotland and Germany than anyone else in Britain, has now swept down on Norway, and to good purpose. He introduces to English readers King Haakon's Hall at Bergen, a grand royal hall of the mid-thirteenth century, describes it in detail and compares it with English, French and German halls. His suggestion is that it was built by a mason from the King's Works in England, and vaulted a little later by a mason with French experience. Dr. Simpson fights the stupid idea that a Norwegian King in the thirteenth century was a kind of belated Viking barbarian. King Haakon had personal as well as diplomatic relations with Henry III, Louis IX, the Emperor Frederick II.

Added to the account of King Haakon's Hall is one of the adjoining Rosenkrantz Tower which also contains a fine thirteenth-century hall and one of the Bishop's Hall at Kirkwall on the Orkneys. A good deal of this he dates convincingly to the midtwelfth century, largely by comparison with the oldest parts of Kirkwall Cathedral, the parts which patently depend on Durham. What Dr. Simpson is anxious to prove is that the Royal Commission on Historic Monuments, here and also, for instance, at Cobbin Row's Castle, is wrong in presupposing long time-lags between metropolitan developments and those on the Western Isles.

BOOKS RECEIVED

BOOKS RECEIVED

LANDSCAPE ARCHITECTURE. By John
Ormsbee Simonds. Dodge Corporation. \$12.75.
EINFAMILIENHAUSER IN STAHLBAUWEISE. By Helmuth Odenhousen. Verlag
Stahleisen M.B.H. (Dusseldorf). DM.38.
SIX HUNDRED NEW CHURCHES. By
M. H. Port. S. P. C. K. SOs.
BUILDING FOR THE AGED. Edited by
F. H. J. Nierstrasz. Elsevier Publishing Co. 85s.
ARCHITECTURE IN ITALY. By Martin
Briggs. Dent. 15s.
ELEMENTARY STATICS OF SHELLS. By
Alf Pfluger. Dodge Corporation. \$8.75.



Sheffield has become a city of violent architectural contrasts, with some of the best recent British buildings outside London rising above a rusty black wilderness of nineteenth-century stone and brick. Such townscape demands the hand of a John Piper to record it, and opposite are two of his recent drawings of the new Sheffield among the old: above, tower blocks on either side of Bond Street; below, tower blocks between Crookesmoore and the Royal Infirmary. Across on the other side of Sheffield stands Park Hill, the most remarkable of Sheffield's new buildings, and the subject of a critical assessment by Reyner Banham on pages 402-410.

Eileen Harris

### THE FARMHOUSE: VERNACULAR AND AFTER

Regardless of its long history, its utility and universality, the farmhouse is one of the least noticed of all buildings. Too tenacious in the face of a changing scene, it has failed to receive the publicity enjoyed by more rapidly disappearing commonplaces. Too simple and ignoble in character, it has failed to merit the scrutiny of the architectural historian. Too popular as a synonym of the picturesque landscape, and as a nostalgic reminder of the quaint simplicities of rustic life, it has failed to assert itself as a building in its own right.

If slighted as a subject of scholarly investigation, the farmhouse has always been a favourite pictorial theme. As such, however, it has been subject to an overdose of romanticism prohibiting an understanding of its form. The hazy views of thatched and timber-framed houses which filled the picture-books of the nineteen-twenties and 'thirties have been technically improved by modern photography. But the sentimental and picturesque image remains unaltered, and very much alive. The only exception is the pictorial survey\* compiled seven years ago by Olive Cook and Edwin Smith. Here, for the first time, the farmhouse was brought into the foreground and given the kind of photographic treatment normally reserved for grander buildings. Unfortunately, this example has, as yet, failed to set the standard for the illustration

of all rural buildings, the farmhouse and cottage in particular.

The first hints of an historical awareness of the farmhouse emerged out of the post-war surge of activity in the fields of social and economic history. With the concentration on narrowly defined areas, and the increased application of documentary information, the farmhouse assumed importance as an essential factor in the assessment of cultural conditions. Data referring to the size and contents of the house has been methodically extracted and often published; but it is generally divorced from the building and used in other contexts.

With the recent publication of Maurice Barley's The English Farmhouse and Cottage† we have, at long last, the first truly systematic history of these previously neglected or over-sentimentalized buildings. It is significant, and in many ways fortunate, that Mr. Barley is not an architectural historian, but a local and economic one. As such, he is as much interested in the functions and inhabitants of the farmhouse as in its structure. He is, furthermore, better qualified than most architectural historians to select, interpret, and evaluate the descriptive evidence contained in probate inventories, wills, leases, and other contemporary records, and to combine such material with a broad and careful study of existing buildings, and archaeological investigation of buried

<sup>\*</sup> English Cottages and Farmhouses. By Olive Cook and Edwin Smith. London: Thames and Hudson, 1954.





1, Manor Farm, Clipsham, Rutland, built in 1639. 2, a Kersteven threeunit stone house of c. 1660, at Kelby, Lincs. Both these pictures are reproduced from Maurice Barley's The English Farmhouse and Cottage.

ones. Although highly specialized, his information is admirably presented in a lucid and readable manner, better illustrated by diagrams and documents, how-

ever, than by photographs.

Prefaced by a survey of the medieval and Tudor house, Mr. Barley's study is focused on the late sixteenth and seventeenth centuries. Within this period he is able fully to relate the development of the farmhouse to the local traditions, and the geographical and economic factors which determined its function, and hence its form. To his dismay, the weakening of vernacular traditions after the Restoration make it impossible for him to continue studying the farmhouse as a cultural artifact. His concluding chapters mourn the rapid ascendance of generalized patterns in place of the individual features which distinguished the old houses of such different areas as Kent and Yorkshire. The farmhouse, becoming conscious of its appearance, ceases to be a vernacular building and approaches 'architecture.' At this point, Mr. Barley's work as a local and economic historian comes to an end. Nevertheless, the history of the farmhouse is far from complete.

As 'architecture' the farmhouse has two beginnings: first, by default of no longer being a building in the vernacular sense; and second, by being recognized as

a valid task for the professional architect. The latter event is of special consequence not only to the development of the farmhouse, but also to the meaning and scope of architecture. In effect, it marks the dissolution of traditional Renaissance concepts, and the beginning of the more expansive modern approach.

To Renaissance thinking the farmhouse was not 'architecture.' It was nothing more than a utilitarian structure designed for profit rather than pleasure. As such, it was relegated to the lowest position in the ascending hierarchy of building. Its form was determined by its function, leaving little to the imagination; and its sole requirements were convenience and health. In short, it had neither art nor profit to recommend itself to the architect. The latter, interested in displaying his skill and enhancing the dignity of his profession, was better advised to limit his services to lovers of art and persons of rank and means.

Nevertheless, visual improvement was not entirely out of the question. Vitruvius suggests the possibility of adding a touch of elegance to the farmhouse by the introduction of a symmetrical plan like that applied to town houses. But the only architectural theorist to actually provide designs for such inelegant buildings was Serlio. His unpublished treatise on domestic architecture begins with the barest one-cell cottage, and advances to the farmhouse, the artisan's house, and so on up the scale. Serlio includes these small dwellings, however, only as a logical point of departure in what he intended to be an all-inclusive survey of the habitations of man. He does not consider them

legitimate architectural forms.

Full acceptance of the farmhouse was clearly impossible without some change in the Renaissance definition of architecture. This was ultimately achieved, not by an overthrow of traditional theories but by various shifts of emphasis within them. The justification of the farmhouse is contained in two peculiarly French views: first, academic acclaim for the absolute beauty of form divorced from ornament; and secondly, rationalist stress on the primitive beginnings of architecture as the models for the more perfected stages. As a result of these interpretations, the simple, unadorned house emerged as a valid and desirable goal. It was recommended not only as the purest architectural expression, but also as the easiest. Since it required no rules other than those of proportion, it promised a wider margin of success for the mediocre architect and greater freedom of invention for the genius. This was the first step towards the admission of the farmhouse. The final opening came with the translation of proportions into feet and inches. Once that was accomplished it was possible for anyone to erect a building of any size or description in accordance with the standards set down by the great architects of the past. This extension of architectural principles was one of the major characteristics of eighteenth-century English Palladianism.

Although architecture was at last made available to the farmhouse, the architect was still to be introduced to the subject. This was effected by the gentleman-landowner who was, in turn, prompted by the development of the English landscape garden. Earlier, the mansion had been surrounded by a knot

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of formality, prohibiting a vision of the rough pastures beyond. When Kent 'leapt the fence and saw that all Nature was a Garden,' the landowner for the first time saw his unkempt farmhouse. The advantages of hiring an architect at this point are succinctly expressed by Isaac Ware in his Complete Body of Architecture (1756): '... the barns, stables, and cow houses will rise like so many pavilions; and the very sheds will assist in the design. . . . In this manner every part will join; and nothing will obstruct the intention of mixing utility with great elegance.' The employment of a professional architect of the first rank to design a farmhouse was, however, an extravagance in which only the wealthy could indulge. The other, and more common, alternative was the pattern-book, which provided a broad selection of designs in the latest styles,

3, design for a farmhouse, from Robert Morris's Select Architecture, 1755.
4, lodge house and farm 'in the Chinese taste' from T. Lightoler's The
Gentleman and Farmer's Architect, 1762. 5, design for four cottages,
from Joseph Sandy's The Rural Architect, 1805.



complete with measurements and estimated costs.

These books, which appeared in unprecedented numbers, were a unique eighteenth-century English phenomenon. Written by architects and addressed to a wide audience, mainly of artisans and gentleman amateurs, they were cheap, portable and easy to comprehend. The enormous vogue which they enjoyed must be seen as a corollary to the Palladian dissemination of architectural gospel. It is certainly significant that the first book of designs for farmhouses, appearing in 1747, was the work of Lord Burlington's personal draughtsman and clerk of works, Daniel Garret. No sooner had the idea of the architectural farmhouse appeared in print, than it was taken up by William Halfpenny, who cleverly saw in it a profitable subject for popular publications. Having no formal precedents dictating its appearance, and seeming to require a disguise for its functional character, the farmhouse became a ready receptacle for all the fashionable styles from the Palladian to the Chinese. Most of these eclectic designs are purely paper architecture, hardly suitable for execution. Nevertheless, the general influence of the pattern-book is visible in the high standard of building throughout the country.

In contrast to the rather long and rambling buildings of the seventeenth century, the eighteenth-century farmhouse is characteristically neat, symmetrical and box-like. This appearance did not require the assistance of an architect, but could be attained by imitating more ambitious buildings. As a rule, however, the symmetry and order applied to the house were not extended to the appearance and placement of the adjacent offices. A compact and orderly relationship between the living and service quarters entailed a preconceived picture of the farm as a complete unit—in short, planning. It is here that architecture made its most significant contribution to the farmhouse.

Later eighteenth-century improvers found the regular facade of the farmhouse unpalatable to their taste for the Picturesque. Seeking the effects of time, weather, and accident, they turned for their models to the vernacular buildings of the past. To complete the circle, one may see in the Picturesque revival of the vernacular the seeds of sentiment which have so long obscured the farmhouse.

Now at last the romantic cloak has been removed. With Mr. Barley's unique historical account of the vernacular farmhouse we have the foundation for any future architectural study of the subject.

#### Chemistry Buildings, Leicester University

THE ARCHITECTS' CO-PARTNERSHIP

The Department of Chemistry required teaching laboratories of 40, 60 and 100 places accommodating altogether about 360 undergraduates; research laboratories and offices for about 70, including readers, lecturers, research fellows and research students; two lecture-theatres seating 80 each and two seating 50; administrative offices, storage, workshops, ancillary rooms, and a departmental library; and a boiler house with sufficient capacity to heat other projected buildings on the site.

This accommodation has been arranged in two separate blocks: one contains the teaching laboratories and lecture-theatres, administration, bulk storage and boiler house, and the other the research rooms. The teaching block is of four storeys, its long axis cutting across the contours of the site; the research block is of two storeys and lies parallel to the contours. They form part of the site layout designed for the University by Sir Leslie Martin, which uses the fall of the ground to create, in principle, two terraces, the upper separated from the lower by a retaining wall about 10ft. high. One end of the teaching block is moored to the upper terrace, which is extended along part of one side of the block so that the main entrances of both teaching and research buildings are approached from it. Below

Site plan of the new science area, laid out by Sir Leslie Martin for the University of Leicester. The two chemistry buildings, designed by the Architects' Co-Partnership, are the first to be completed and are illustrated on the following payes. They are marked A and B on the plan. The other new buildings are C, lecture theatre; D and E, physical buildings: F and G, biology buildings; H, senate. J and K, are the existing buildings. C, D and E are now under construction (architects, J. Leslie Martin and H. St. John Wilson).

this terrace extension the two buildings are linked by a semi-basement.

The planning of the teaching block aims to concentrate the main weight of student circulation on the lower floors and to minimize it on the upper floors. The ground floor is at upper terrace level and contains entrance hall, lecture theatres, professors' and administrative offices and library, and also a radio chemistry laboratory. Above it are two floors of teaching laboratories. Below it, at the level of the lower terrace, is a floor of storage and workshops, with cloakrooms and ancillary rooms in the link to the research building and access to the service road. The large teaching laboratories are planned as openly as possible around the northern core of circulation, fume-cupboards, ventilation trunking and ancillary rooms, and are separated from one another by light partitions or glazed demonstrators' rooms, so that there is a fair degree of flexibility if adjustments are needed in the future in the relative sizes of the laboratories. Fixed benches are laid out at 10ft, centres. and serviced from a perimeter duct below window-cill level. Service pipes to this perimeter duct from the northern core are gathered together at three points and are slung exposed below the ceiling. Ventilation trunking, etc., is in the void above corridor false ceilings. A large plant-room on the roof accommodates water storage tanks and processing plant, lift motor, inlet air plant and extract ventilating fans, the latter discharging through louvred openings in the walls.

The ground floor of the research block is at upper terrace level, the main entrance being opposite that of the teaching block. Both floors contain similar laboratories and are planned round a central core of stores, lavatories, ancillary service rooms and staircases. One of the stairs and a goods lift descend to the semi-basement level of the link. The planning module for partitions between laboratories is 10ft., giving a minimum-sized laboratory of about 150 sq. ft., and provision is made in the floor slabs for vertical ducts at 20ft. centres adjacent to corridor walls, so that fume-cupboards can be fitted in any rooms whatever rearrangement of partitions is made in the future.—

Benches in the research block take the form of tables with loose underbench storage units. These tables are

[continued on page 383







# SCIENCE **EXPANDS** THE UNIVER-SITIES

Of the many English universities that are building to accommodate the expanding requirements of scientific education, Leicester is one that has planned a self-contained new science area—see site-plan opposite. The two chemistry buildings illustrated here are the first to be completed. Others are under construction as the air view above, 1, shows. The main university buildings are on the right of the picture.



2 (above), the paved p.atform linking the teaching block, left, and the research block, right.















clamped to permanent service strips along walls and under windows and can be arranged in a variety of positions. Each fume-cupboard in the research block is served by an individual fan mounted in the open on the roof directly over a vertical duct and discharging

above plant room canopy level. Inlet air to the plant room is drawn from below canopy level through louvred openings in the plant room walls.

The construction of the teaching block is in-situ concrete with columns at 20ft. centres, except over the two larger lecture-theatres where the span is

The photographs on the facing page all show the teaching block, 3, closeup of the main entrance facing the research block (see also 2 overleaf). The structural frame is faced with black unglazed ceramic mosaic. Window-frames are teak; sliding windows and top-hung ventilators are aluminium. Steps are precast concrete. Back wall of porch is also faced with unglazed ceramic mosaic. 4, the entrance hall, looking outwards. The perforated ceiling panels screen hot water heating coils. 5, a lecture-room seating 80—heating in ceiling (see above); maple boarding on walls; iroko flooring and furniture; chalk-board of glass;

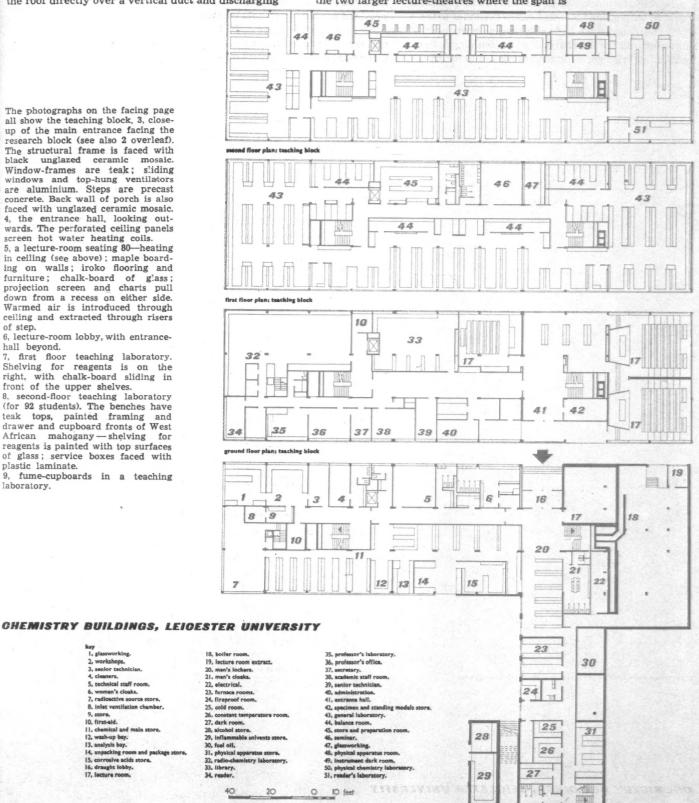
projection screen and charts pull down from a recess on either side. Warmed air is introduced through ceiling and extracted through risers of step.

6, lecture-room lobby, with entrancehall beyond.

first floor teaching laboratory. Shelving for reagents is on the right, with chalk-board sliding in front of the upper shelves.

8, second-floor teaching laboratory (for 92 students). The benches have teak tops, painted framing and drawer and cupboard fronts of West African mahogany - shelving for reagents is painted with top surfaces of glass; service boxes faced with plastic laminate.

9, fume-cupboards in a teaching laboratory.



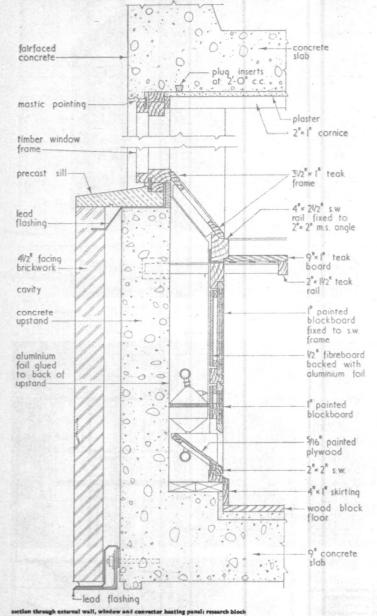
- 2, workshops,
  3, senior technician.
  4, cleaners,
  5, technical staff room.
- 6, women's cloaks. 7, radioactive source store.
- 8, inlet ventilation chamber

- 8, inlet ventilatio
  9, store.
  10, first-aid.
  11, chemical and n
  12, wash-up bay.
  13, analysis bay.
  14, unpacking root
  15, corrosive acid:

- 15, corrosive acids store 16, draught lobby. 17, lecture room.

increased to 40ft. Floors are flat in-situ slabs 12in. thick. The structural frame is faced externally with matt black mosaic, and infilled with aluminium windows in teak subframes. The louvred walls of the roof plant room are in cedar. Similar in-situ construction is used for the research block, except that the external columns are faced with precast polished concrete similar to the physics building on the same site, used as permanent shuttering, and the internal core of the building is in loadbearing brickwork. External walls are in facing

brickwork, and windows in teak. Heating in the teaching block is principally from radiant panels (hot water) cast in the soffit of floor slabs. In the research block convectors are used below windows to give simpler control in individual rooms. Tempered inlet air is provided to laboratories and lecture-theatres. Services provided are hot water, cold boosted water, de-ionized water, gas, electricity, steam and drainage. Independent drainage is installed for radio active wastes, with equipment for collection, treatment and disposal.



etc. The lower floor of the teaching block is faced with London stock bricks-for materials of superstructure see caption on page 383. 11, the western side of the research block looking towards the teaching block—paving of precast concrete and granite setts; plinth of bushhammered concrete: brickwork. London stocks; columns of reinforced concrete frame are faced polished precast concrete units used as permanent shuttering; windows, teak with precast concrete cills with aluminium drips.

On the facing page: 10, the teaching

block from University Road, which

runs along the lowest edge of the site—see plan on page 380. On the right is the paved platform linking this block with the research block.

Beneath the platform are furnace-

rooms, fireproof room, cold room.

y 12, professor's office,
sambor technician,
office. 13, professor's laboratory,
office. 14, fellow,
office. 15, students' physical chemis
two-fellow laboratories. 16, reader,
17, special operations,
students,
entrance,
19, glassworking,
store,
polarimeter,
instrument dark room,
21, saminar,
22, students,
23, distillation

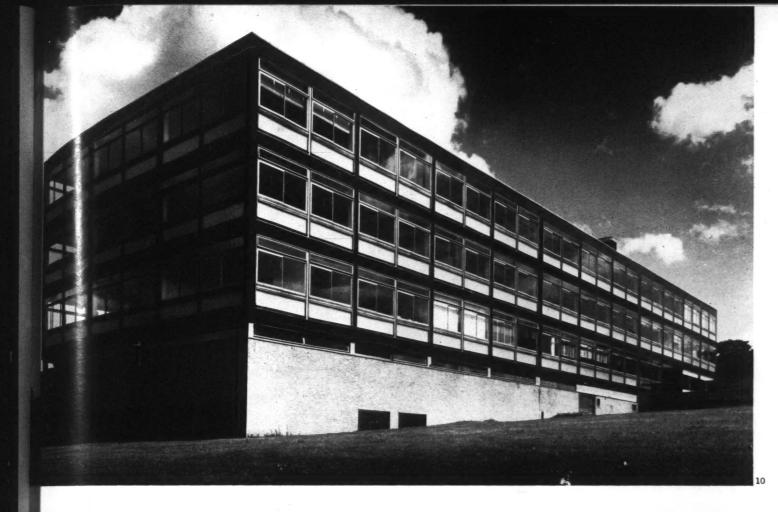


ground floor plan; research block

**CHEMISTRY BUILDINGS, LEIGESTER UNIVERSITY** 











#### CHEMISTRY BUILDINGS LEIGESTER UNIVERSITY

photographs by H. de Burgh Galwey



The photographs on this page show the research block, 12, from the west, with the service road below the ground-floor platform and, at road level on the extreme left, the entrance to an independent inflammable solvent and alcohol store.

13, steps from service yard between research block and the store referred to above.

14, corridor with solid wall of central core on left and glazed screens of small research laboratories on right; in the distance, a large students' laboratory.

students' laboratory.

15, looking the opposite way to above; from within a large laboratory; group of fume-cupboards on right.





# GENTLE, NOT GENTEEL

Not many words can have changed their meaning so decisively as gentility. To the eighteenth century it meant being fashionable and elegant: to us it means the futile aping of what is thought to be fashionable and elegant. It is second-hand living which thinks it is first-hand, always mistaking the illusion for the real thing. This kind of abdication from life will always happen, and in the abstract is not connected with any particular style—I would call a person genteel who was not prepared to see the virtues of Carl Orff or Sir Reginald Blomfield because they are not now fashionable: equally genteel are those AR readers who now affect to like only Egyptian lettering.

In fact, the particular pressure which changed the meaning of gentility was connected very closely with a particular set of styles, and a particular way of applying them. Neo-Tudor, neo-Georgian and a kind of lowest common denominator of the lot which is best called neo-Nothing burst on us like a flood at the beginning of the century. The motive power was the ability of a huge mass of people to think they could move upwards socially and outwards physically. Both directions, of movement, upwards and outwards, were really illusions, genteel illusions done not for their own sakes but for the social cachet which they brought. To move out in the hope of finding green fields is one thing: to move out because it is supposed to carry some social amelioration is quite anotherand equally, to move to Chelsea because it carries an artistic cachet, or even to move to Lambeth because it carries a cachet of inverted-snobbery.

Things must be done for themselves: and the 'must' is a law of nature, be-

cause the falseness will surely show. If a house is built for the wrong reasons it will always look wrong. A nouveau riche Elizabethan building still rings false after four hundred years: Wollaton was built for social aggrandisement and looks like it, Hardwick was built for its own sake. Hence to say that it is impossible to build properly for gentility is not to be dictatorial, it is simply stating a fact of life.

But building for gentility is not the same thing as building for illusion. It is a tragedy that the genteel flood overtook an older and nobler tradition of suburban building, one that was 'genteel' in its original meaning. The difference is between illusion done for the sake of the illusion, and illusion done for an extraneous second-hand reason. And illusion done for its own sake must know it is illusion—something which may sound like a quibble but which in fact is crucial.

The archetypes of this true tradition of illusion are Watteau's shepherds and shepherdesses, playing pretty games with tragedy and longing in their eyes: after us the deluge. But it is just as evident, and much more relevant, in Jane Austen's fearless quietness. What she is saying in her novels is: 'there are some segments of life which I do not wish to consider. I know this; it is a deliberate decision, and does not affect the validity and depth of my observations on what remains.' An equivalent bad-genteel novelist would refuse to consider X and Y and Z, and allow the refusal to poison the rest of the book. Equally wrong, of course, is a writer who only considers X, Y and Z. The Naked and the Dead, brilliant and moving as it was, perhaps did this. The invertedgenteel imitations of it, such as *Battle Cry*, certainly did. The architectural consequences of acting like this will appear later.

The exact architectural equivalent in time and feeling to Jane Austen is the cosy thatched Regency seafront at Sidmouth. This says: 'there are things about marine life I do not wish to consider, though I know about them-storms, violence and shipwreck. But the sunny happy seasidy things I can and will express perfectly.' It is precisely the spirit of Nash's Blaize Hamlet, of all the other Picturesque suburbs, of 'arcadia.' Blaize Hamlet was violently different from Blake's belching Albion, but it was not designed without cognisance of it. Nash in fact was a genius broad enough to be able to design for illusion and reality simultaneously. Regent's Park, that triumph of illusion, was originally built with utterly Cockney streets and squares behind it.

The tradition continued through a century which, in spite of its sexual and religious attitudes, was not really genteel. Suburbs like Rock Park near Birkenhead or Albert Park at Abingdon are as down-to-earth as a Victorian dinner, the Victorian Town Hall at Birkenhead or the Victorian Corn Exchange at Abingdon. They may not have chosen to see all of life (I think this is a fair comment on arcadia as a whole) but what they saw, they saw straight. The same is true of the early garden suburbs like Letchworth and Hampstead, and particularly of Port Sunlight\* a splendidly beefy exposition of

<sup>\*</sup> A place incidentally where the housing and the Lever factories butt up against one another tout court. Very well they look together, too.

the perennial truth that in the end the important thing is not what you do but how you do it. Every time the suburb was done for itself, not second-hand, the golden thread continued: the outstanding place to see it between the wars is Welwyn. It persisted in a direct line to those New Towns which frankly realized that they were creating a new generation of garden cities—and nothing wrong in that, as long as it is not the only alternative. In this sense, Crawley and parts of Bracknell are more successful than New Towns such as Harlow which tried to be towns. There's not much real point in the pedestrian centre of Stevenage if it is surroundedas it is-by a howling wilderness of lampstandards, traffic and non-relationship. Better by far to try to make the whole lot leafy, as Crawley does.

The nicest of the new garden neighbourhoods in the unbroken tradition could happily link hands with Span, in the rediscovered tradition. Thank goodness. But meanwhile, a particularly sad social and historical accident had overtaken a very charming way of building. What was originally a recherché alternative for Top People became, by the end of the century, a possibility for millions-or, at least, the illusion of a possibility, marked exactly by the moment at which the Pooters set out for Holloway in that brilliant exposition of gentility, The Diary of a Nobody. Most of the new mass suburbs were built wrong from the start, and it always shows: after sixty years, bowfronted Upper Holloway and East Dulwich are as mean and spiritless as when they were built.

Inevitably the false suburbs, built from the wrong place in man, and for the wrong reason, came to stand for the true. And once created, they became horribly selfsufficient, not even concerned with the wish to cross social layers, which is at least understandable human frailty. In terms of poetry, Herrick's

"The soft sweet moss shall be thy bed, With crawling woodbine overspread: By which the silver-shedding streams Shall gently melt thee into dreams'

—which can stand for the shepherds and shepherdesses—has become John Betjeman's famous

'Phone for the fish knives, Norman, As Cook seems a little unnerved You kiddies have crumpled the serviettes And I must have things daintily served.'

The architectural consequences are familiar enough. Architects began to build neo-Tudor or neo-Georgian neither as a game nor out of Puginesque conviction, but second-hand, for the sake of conforming to a false ideal. Builders and building societies multiplied the falseness because it paid off, and then proffered the bogus

ideal, for the sake of the mortgages, in front of people desperately wanting somewhere to live.

No hope, there, for a change of heart. The change is coming, slowly—and no thanks to the building societies, no thanks to the majority of architects—through the removal of the original urge to gentility. Social movement, except at the very top, has become meaningless—what class is Slough or Harlow New Town? However amorphous and however undistinguished, we have at last got 'just people.' Whatever can be built on this can be real; if we wish to build an illusion, it will be illusion for illusion's sake.

And, obviously, millions of people do wish to build illusion. I don't, as I think will be clear from the way I am writing. I am delighted by Welwyn and Span, I love to go and see them, but after three weeks in them I would be desperate. That is just the way I happen to be: perhaps because of it, I will bend over backwards to insist that anyone who wishes to enjoy illusion ought to have it. And we now have the architectural style to meet the need (we didn't in the 1930's: the result of Wells Coates or Connell, Ward & Lucas building for illusion would have been bizarre. In a decade when the living style was so uncompromising, a flight to half-timbering was perhaps the only possibility). In the Festival of Britain style and its descendants we have something as perfectly suited to arcadia as was the original Picturesque cosiness. And, very slowly, and very largely thanks to the pioneering work of Span, the dinosaur of British business and finance is lumbering along afterwards.

Span has popped in and out of the text like a punctuation mark. Justifiably, for it is as good an exemplar of the revived arcadian tradition as Nash was of the original. Eric Lyons's landscaping is as good as Nash's, and like Nash he builds for illusion without having illusions himself. He frankly calls himself a suburban architect, and so he is: a superb one. As the illustrations on page 391 show, many more architects are first-rate suburban or arcadian designers also. Tayler and Green are, Llewelyn Davies at Rushbrooke is, the Nottinghamshire schools are, the DRU pubs are, the Civic Trust repainting schemes are.

This is a splendid thing, as long as it is a servant, not a master. And before it can be a servant to the environment at large, it must be master in its own house, i.e. arcadia, its proper place. Around London, it may well be. But in the provinces the old, bad, genteel style is still in charge. And, alas, the further in spirit from London and the less and less places ought to be

[continued on page 393

The tradition of building gently but not genteelly begins on a large scale in the early nineteenth century with Nash at Blaize Hamlet, 1, and groups like the front a Sidmouth, 2. The eighteenth century, except for a few dilettanti, would in such circumstances have used the current classical style.



The same standards were kept up in the Victorian suburbs, whether Early (Rock Park, Birkenhead, c. 1840, 3) or High (Albert Park, Abingdon, 1865, 4), and were carried on in the earliest garden suburbs—such as Bournville and Port Sunlight, 5.



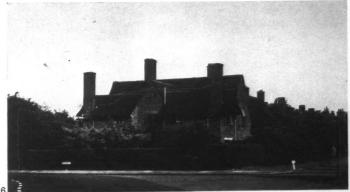






#### the arcadian tradition

In the present century the thread becomes thinner, but it is evident in every real suburb—Hampstead, of 1910, 6; Welwyn, of 1930, 7; Crawley New Town, of 1950, 8. At the same time a genuinely fresh and dainty pattern of small-scale lettering and decoration has persisted in most suburbs or near-suburbs along with the olde and the blucsy. 9 is from Knutsford, 10 from Pinner; both were photographed in the last few weeks.









#### the tradition broken

When the suburban ideal became second-hand, not done for its own sake, gentility crept in, and with it the architectural gentility of styles used without any conviction. Pre-war examples abound, but this selection is all newly built. 11-14 (right) show Queen's Head Court, an astonishing performance recently built into a corner of one of the best and least genteel market-places in Britain, at Newark. For a complete repertoire of false cosiness, Tudor and Georgian, it would be hard to beat. 15 is a pub near Ilford, with every motif used half-heartedty; 16 is a brand new building on one of the most important sites in Leominster, which is a complete abdication from any aesthetic decisions whatever. It could well be called neo-Nothing. By comparison (but only by comparison) the patent absurdity of Wookworth's new front in Chester, 17, is almost a relief. And when a thing is obviously done as a devoted labour of love, even the most outrageous half-timbering is not genteel; 18, the Grasshopper near Westerham, has old bits and pieces from everywhere, collected and assembled by the owner. You may like it or detest it, but at least it is building a deeply felt illusion.







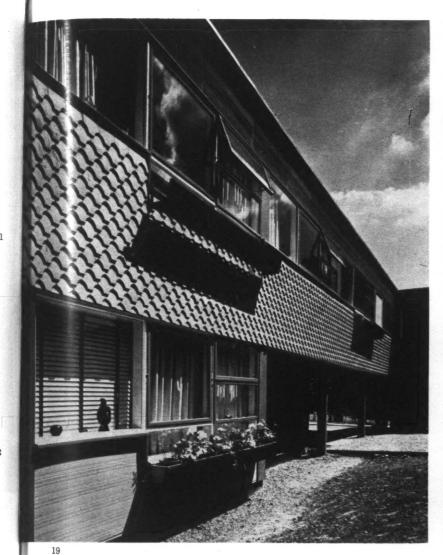












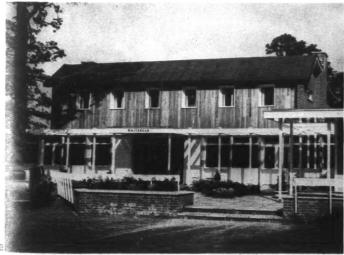






the tradition maintained

Only when photographs are juxtaposed is it clear how much of English architecture is arcadian, and how similar in essence are the pubs, factories and housing, however diverse they may seem when seen by themselves. The collection on this page includes not only Span, 19, which is the natural leader of suburban building in England, but housing by Grenfell Baines, 20, factories by Tayler and Green, 21, and Austin-Smith and Partners, 22, a new pub by Musman & Cousens, 23, and a Nottinghamshire school, 24, which is just about indistinguishable from the Span housing illustrated. With a vocabulary like this, all of which is fresh, not genteel, there is no need to look to any past style to satisfy the needs of arcadia.





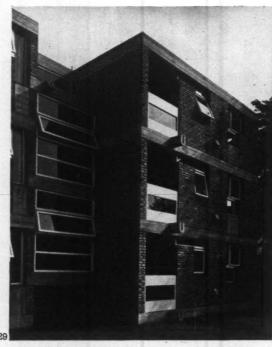


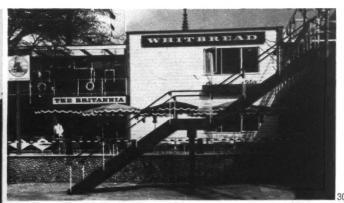






arcadian misused











building rough

The arcadian style is easy to look at, easy to design. It must not become a norm to be applied regardless of circumstances. There are signs that this is happening. The use of lettering is the harbinger: a Watneys pub uses the admirable DRU manual to ridiculous effect in a Cockney shopping street, 25; estate agents in Huntingdonshire employ fascia lettering as underscaled and out of place as a monster old-style Burtons would have been, 26. Nor'is it always a matter of unwise imitation by local designers. A real no-illusion place like Burslem, when it was done up by the Civic Trust, got-among much good design-ridiculously twee signs for its Ladies and Gents, 27, and Ind Coope, whose pubs are usually among the best in the business, made an inelegant pre-war front much worse by timid and rule-bound lettering, 28. If this goes much further our last state may be worse than our first.

As the arcadian style takes hold, unselfconsciously rough design becomes harder and harder. These first three examples all tried to be rough and ended by being another very nice kind of arcadia. 29, Stirling and Gowan's flats at Ham Common; 30, the pub at the Brussels exhibition; 31, LCC housing at Haverhill, Suffolk. This last is very near the borderline, far more unaffected than, for



example, the much admired Rushbrooke housing, 32 (compared in the accompanying article with Blaize Hamlet), but it still has some way to go before it reaches the spontaneity of these post-war cottages in Wiltshire, 33, by an unknown architect. At the other end of the scale is Lasdun's block of flats in St. James's (AR July, 1961) which shows a natural freedom from self-consciousness. For most designers this must be a long and arduous job of self-understanding, of unlearning the clichés and stock ways of thought loaded on in architectural training. Just as in life, the hardest thing to do is to relax. Yet it can be done, a point made by two different recent schemes by Morton and Lupton at Wallingford. In the first, 34, architectural niceties were still getting in the way of a straightforward wall-with-holes-in. In the second, Priory Mews, 35, a way of building has been reached which is genuinely urban, genuinely unselfconscious, and (apart from anything else) very cheap. This does not inhibit prettier design where it is needed, nor is it an artificial roughness. It is simply common-sense building.

continued from page 388]

exposed to gentility, the more likely they are to be inflicted with it. 'Amenity' near London now usually means something which is at least pretty and decent: 'amenity' in the best provincial towns means something to be feared. The brand new Queen's Head Court inserted into the Market Square at Newark is a desperate proof of that. And a lovely truly-rural town like Leominster can find nothing better than illustration 16 to put at its main road junction. Woolworth's new front at Chester is more absurd but perhaps more comprehensible; and, even now, it is possible to build half-timbered houses for the joy of it, in an ungenteel way. They may be misguided, but they are not false. So the Grasshopper near Westerham, still being enlarged to the amazement of travellers along A25, may look wrong but feels right. At a higher level, Raymond Erith's neo-Georgian both looks and feels right because it comes from the right place. It can't be said too often that gentility is not 'what' but 'how.' It has become attached to a particular kind of 'what,' which tends to have half-timbering or pediments; but each case must be judged by itself.

Perhaps I am leaning over backwards again. It is easier, simpler, prettier, to build in the style of the time, a style which seems set to rival Nash at his own game. It is a style we can be proud of, as long as we realize its limitations . . .

. . . and now, having seen the last page of the illustrations, you may realize what the limitations are. The trouble is that we are beginning to be able to build for nothing else but illusion. In the land of bitter beer and roast beef, everything, everywhere, is becoming pretty and refined. There is a terrible danger, just because these arcadian forms are so beguiling and crisp, that they will become a new norm rather than a specific solution for a specialized need. Then illusion will again be taken for reality, and we will have the gentility all over again, in a much more insidious form. Good Taste has ceased to be ghastly, but applied universally it can be just as suffocating.

This puts a terrifying responsibility on the architects. It is so easy to be universally pretty, and every bit of an overprecious over-selfconscious five year training tends to make it easier. The lucky few, genuinely unselfconscious, have enough personality in them to come through it unscathed—and enough ability and sensitivity to make good architects. But it is a rare combination: there are plenty of unselfconscious architects, but they tend to be unconscious as well.

The second course is to react against prettiness artificially, as an alcoholic might have to refuse even one drink. This produces the kind of inverted gentility I was talking about in novels like *The Naked and the Dead*. The result is understandable, but a bit ludicrous: everything is rough for the hell of it, not rough from its needs. Prettiness will out: at best you get—as at Stirling and Gowan's Ham Common flats—a kind of brutal elegance which is exactly the same in spirit as Span at Ham Common, however much the details differ. At worst, the result is just a weary joke.

The third way, and a hard enough one, is equivalent to a religious purification or a searching self-analysis, according to your beliefs. It involves deliberately not thinking architecturally, deliberately going back to the needs first and evolving commonsense solutions, and yet just as deliberately refusing to react into skin-deep brutalism. It involves freeing man from reaction, from stock responses, whilst not cutting off any true responses. And stock responses are what is pumped into the budding architect from the moment he begins training-by the school, by fellowstudents, by the architectural magazines, God help us. It takes about a year of hard work and perhaps unhappiness: but it can be done, and it is magnificently worth doing. At the end you are a free man, free of styles and 'isms-still free to build pretty or slick or how you will: but no longer does the style build you. One of the few firms which have done this deliberately is to be found not amongst the avant-garde in London, but away from the mainstream at Wallingford-Morton and Lupton, or Townmaker. To build Priory Mews in Wallingford took them almost a year of re-thinking. To produce common-sense buildings like this seems to be, for English architects, the hardest job of all. By an irony, it is not susceptible to glossy photography—but it is good to live in and to be with. Many of the buildings illustrated, in the AR and elsewhere, are just the opposite.

There must be more firms than this. There had better be. Millions of people do want to live arcadian, but millions more do not. Who is to speak for themand for me?—and not, please, in terms of intellectually conceived roughnesses. My own private version of hell is a town with everything in Civic Trust colours, all the housing done by Span, all the pubs done by DRU (except, perhaps, for a rough corner done by Stirling & Gowan and the Smithsons). It could happen, and it is not the answer any more than the awful oldgentility of Queen's Head Court in Newark. As part of an environment it is marvellous: as the whole environment it is those old fish-knives of John Betjeman's coming out again, to deal with an elaborate Continental dish instead of poached cod.

# THE MOTEL GOMES TO GREEGE

The Greek national tourist organization has a large programme of hotel building both on the mainland and on the islands. A number of recently completed projects have been of the motel type, of which four are illustrated here. 1, above, shows the terrace of the motel at Kalambaka (see also pages 396-397).

# 1, at Igoumenitsa ARCHITECT: ARIS KONSTANTINIDIS

This is the terminal point of the ferry that has been running since the summer of 1960 from Brindisi, Italy, to the north-western coast of Greece opposite Corfu. The motel has a central building with restaurant, bar and kitchen planned round a courtyard, a reception area and a manager's flat, and four two-storey pavilions each with six double rooms on the upper level and a car-port below. Four additional pavilions are planned. All planning is on a 13ft. square grid. Construction is a reinforced concrete frame, proof against earthquakes, with infill walls of brick in several bright colours. All rooms are air-conditioned.

# 2, at Larissa ARCHITECT: ARIS KONSTANTINIDIS

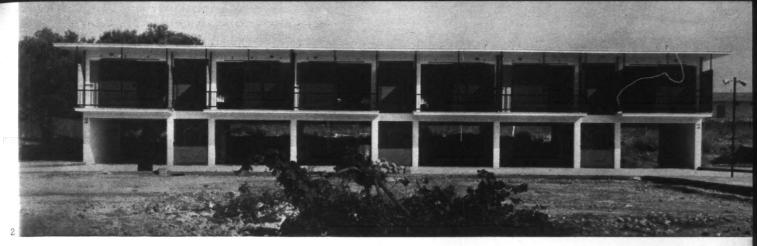
The motel is two miles outside the town, on the express highway between Athens and Salonika. The layout is similar to that at Igoumenitsa except that the small offices where visitors check in and out are incorporated in the central building instead of being separate structures. At Larissa eight six-room pavilions have already been built, providing altogether 48 double rooms, which have a wide view over the plain. Construction and materials are as at Igoumenitsa. A swimming-pool is planned.

# 3, at Kalambaka ARCHITECT: ARIS KONSTANTINIDIS

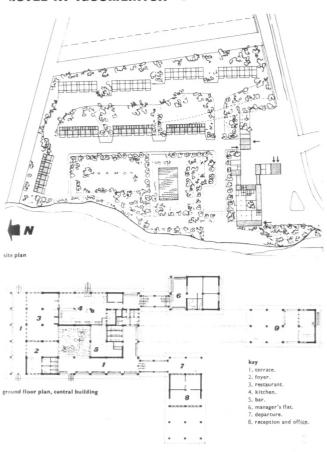
This is on a steeply sloping site just outside the town with a mountain background. The 22 double rooms are in one three-storey building (again with car-ports occupying the ground floor), parallel with the central building higher up the slope and linked to it by an extension of its roof. This roof provides a sheltered drive-in and also covers the reception office. Construction is again in reinforced concrete but with infill walls mostly of local stone.

# 4, at Mesolongi ARCHITECT: YANI TRIANDAFILIDIS

The motel faces south over the lake, and is built on a flat, featureless site. It is raised 4ft. above the ground on timber piles. In this case the six double bedrooms (again raised above their car-ports) are not in separate pavilions but are attached to the main building on the side nearest the lake and are reached by a staircase from it. An extension of another 14 rooms is planned. The building has a reinforced concrete frame planned on a 13ft. square grid, with infill of rough plaster and local stone. The public rooms are heated by warm air, the bedrooms by hot-water radiators. Furniture and fittings were designed by the architect.



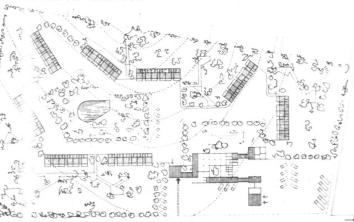
MOTEL AT IGOUMENITSA



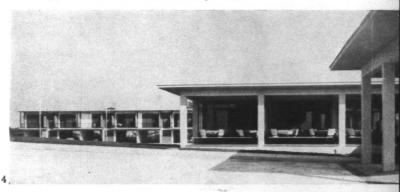
 $2, \ \mbox{balcony}$  elevation of one of the two-storey pavilions.  $3, \ \mbox{the}$  restaurant in the central building.



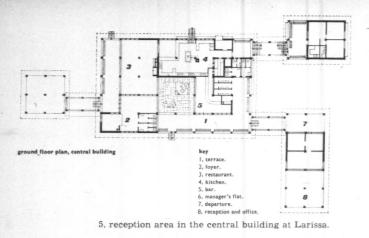
MOTEL AT LARISSA

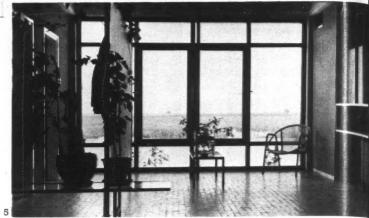


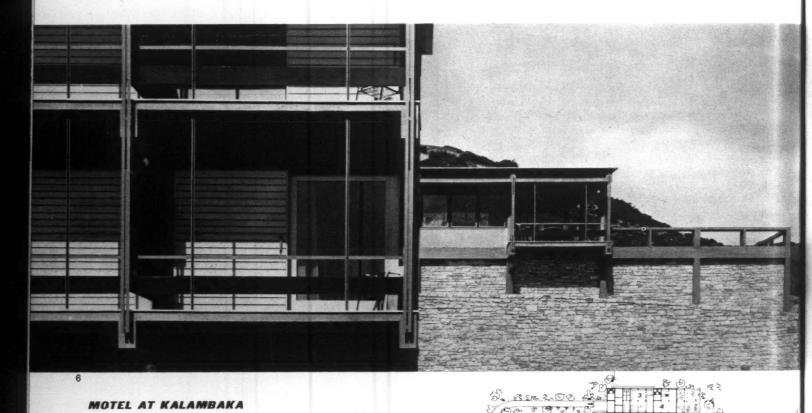
 $\mathbf{4}$ , looking past the restaurant to one of the pavilions.



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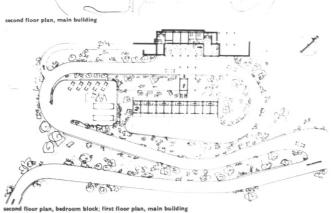


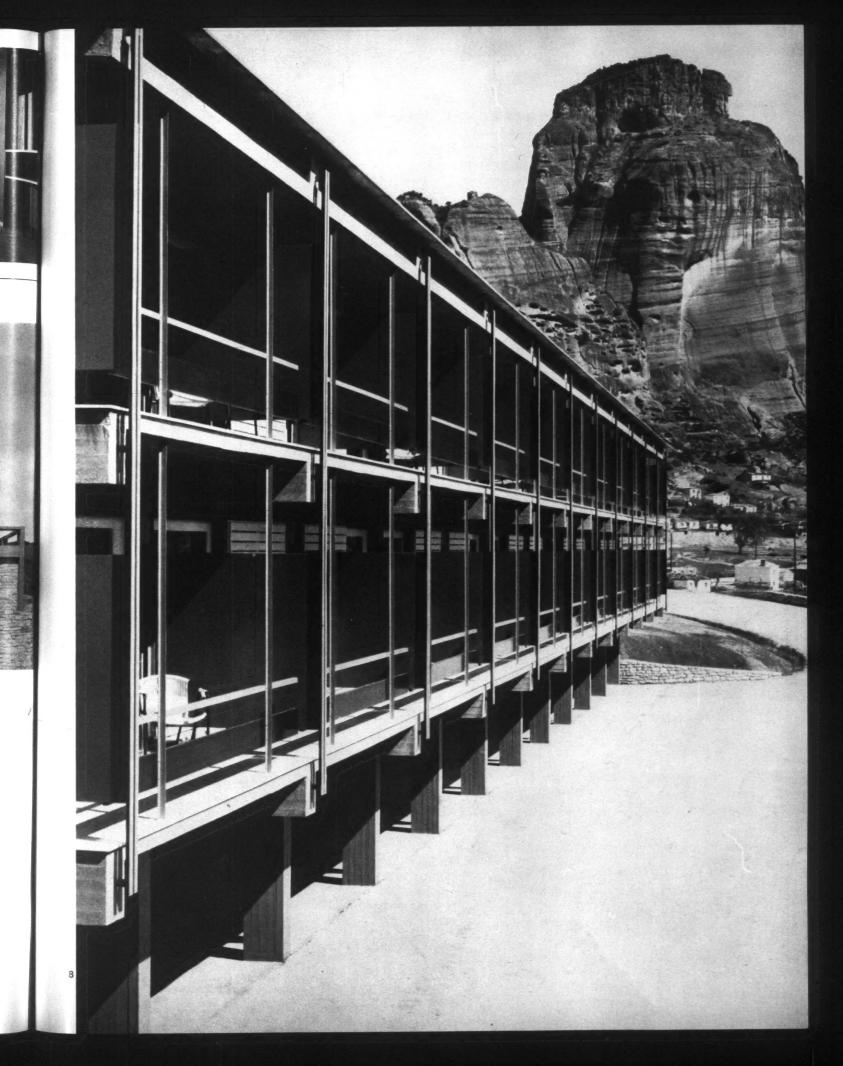
#### MOTEL AT KALAMBAKA

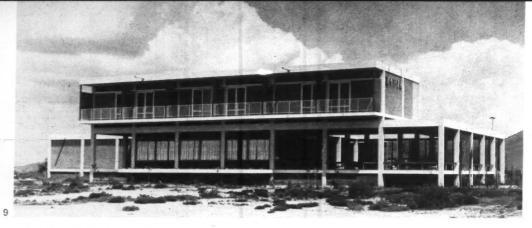
1, reception.
2, bedroom block.
3, kitchen.
4, restaurant.

6 (above), looking past the bedroom block to the restaurant in the main building. 7, general view from the east. 8 (facing page), looking along the balcony elevation of the three-storey bedroom block.









#### **MOTEL AT MESOLONGI**

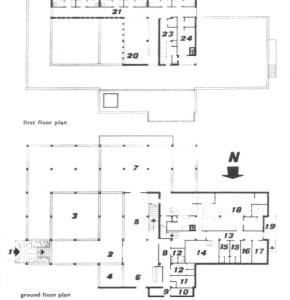
- key

  1. entrance.
  2. covered porch.
  3. large patio.
  5. hall.
  6. reception.
  7. restaurant.
  9. to future extension.
  10. bagagge.
  11, office.
  12, w.c.

- 13, service entrance corridor.
  14, boiler room.
  15, staff w.c.
  16, storage.
  17, staff restaurant.
  18, kitchen.
  19, service entrance platform.
  20, upper part of hall.
  21, corridor.
  22, bedroom.
  23, service.
  24, manager's bedroom.

9, from the south. 10, first floor corridor with bedrooms off. 11, ground floor reception area.





4

ground floor plan

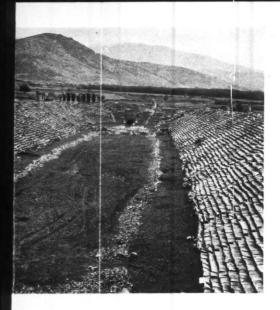








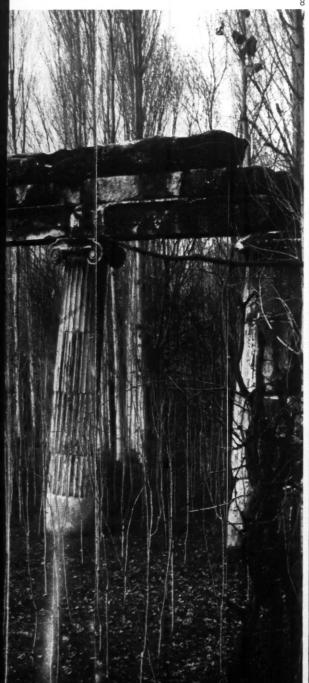






#### aphrodisias

4, half-buried columns on an old road to the city. 5, remains of the temple. 6, the practically intact stadium, which is over 750 feet long and gives an indication of the size of the population of the old city. 7, sculpture used to decorate a village house. 8, a colonnade rising from a culticated field. 9, relics of marble columns, some of which villagers have used to build a canal—see also the cover of this issue. Photographs by Ara Giller









the exploring eye

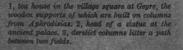


The ancient city of Aphrodisias, in the Meander valley of Anatolia, seems to have been neither founded nor sacked by any God or General of particular note, and its name is therefore known only to specialist scholars. Yet it contributed to the Roman world at least two items of interest—a cult of the Aphrodite of Aphrodisias, whose temple is dutable to about AD 135, and whose image, in replica, has been found well beyond the contines of Asia Minor, even in the Forum of Rome; and a school of sculptors who flourished in the reigns of Caracalla and Septimius Severus, who worked as far afield as Lepcis Magna, and who possessed the habit, rare and praiseworthy in the ancient world, of signing their works.

As the seat of a Bishopric from AD 395,

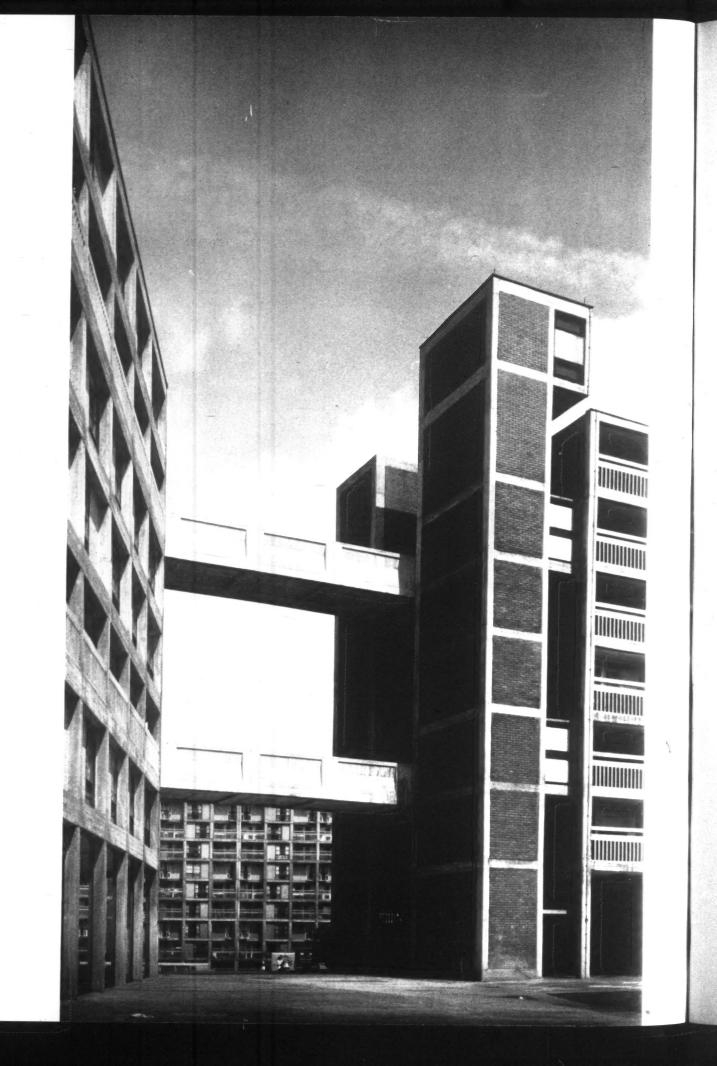


Aphrodisias was a place of some substance in the Caristian Empire, but subsequently faded from the world's view, and its site is now occupied by the village of Geyre, which squats among the remains of heroic and expressive architecture, much as the villagers of Greece populate the ruins of Athens in eighteenth-century engravings. Indeed, Aphrodisias, hardly touched by archaeologists, is the last of the great picturesque classical sites that can still be seen in the condition in which time and nature have left it. Now, however, a team from New York University is to excavate there and develop a field teaching centre for archaeologists and classicists . . let us hope that they will do everything possible to preserve the unique and dreamlike ndscape that is recorded here in Ara Güler's rhotographs.









## Reyner Banham

Architects: Sheffield Corporation City Architect's Department City Architect, J. L. Womersley Project Architects, Jack Lynn, Ivor Smith, Frederick Nicklin.

Park Hill housing, Sheffield

Park Hill, Sheffield, is a singular edificeand its singularity must not be blurred by the use of vaguely plural terms such as 'scheme,' 'group' or 'complex'. The vast size of the building, and the fact that it has more ends than the customary two, may give the impression in some photographs that a number of blocks of flats can be seen. But this is not so-two steps on the site will at once show that this is a single block of dwellings, however complicated in plan form. Nevertheless, it emphatically reverses the current orthodoxy that conceives a 'block' in terms of a classical insula, an elementary form that can be seen and appreciated from a single viewpoint—as can Le Corbusier's various Unités, or Reidy's serpentine block in the Pedregulho development, whose wavy form merely demonstrates that a Brazilian can do the Samba without ceasing to be as much a classicist as Corb.

But if Park Hill, a building with two main façades which are not always on the same side of the building, and five ends, one of which is in the middle of the site—if it diverges so far from the Aristotelian unity of the classical insula, is it an 'anticlassical' building, in the sense in which that term began to be bandied about by the more talkative junior segments of the profession at the time it was being designed? It would be tempting to suppose that it was a programmatic building of this sort, because the project team was certainly in touch with talkative metropolitan circles in architecture, as well as

very sophisticated aestheticians of what someone will one day call 'The West Riding School,' based on the universities of Sheffield and Leeds.

And yet, the critic must remember that against Wittkower's 'explanation' of the Villa Rotonda's four porticoes in terms of Renaissance theories of symmetry and proportion, there is André Lurçat's equally cogent functionalist 'explanation' in terms of the four views the porticoes had to command. It often happens that a building that is formally striking has achieved that form for functional reasons that are as convincing as the formal ones, and it is better to err on the side of function than jump at formalist explanations for what can be seen on the site.

In Sheffield, the site itself makes a good beginning to critical examination. It is a crop-pointed triangle, with its two long sides extending up a fairly steep hill from the blunted point which stands just above the railway cuttings in the bottom of the Sheaf Valley, and the whole site is very much in view from all other elevated ground in Sheffield. Along the less visible side of the site fitful earlier attempts to redevelop this notorious slum area reveal only too clearly how inadequate are smallscale, piecemeal reconstructions on such a slope, and it was clearly good architecture as well as good economics to take one really big bite at the job rather than several small nibbles. It was also remarkably sound townscaping to so arrange the folded plan of Park Hill that it presents

A system of vertical and horizontal communication, articulating and lending giant scale to continuous bands of repetitive domestic units, gives the key to the basic design conception of the Park Hill block, Sheffield. Designed by the Sheffield City Architect's Department, this most imaginative and advanced community-building gesture is the subject of this month's critical article.

a continuous wall of building on the more visible side, and thus create a big single dominant form over an area that is visually irresolute when seen in long views across the valley—one of a number of points on which Park Hill seems able to challenge comparison with the well-known Cerro Piloto housing outside Caracas (cf. AR November 1958, page 338).

The decision to make the whole scheme one building (barring some shops and a small school) gives, obviously, a unity to the design, but 'unity' is a word that has taken a terrible beating of late, and it is worth while to see what lies behind this obviousness. Firstly, there is the unity of place, such as any large construction bestows on the area it dominates, but reinforced by the fact that quite a lot of ground is practically surrounded by the arms of Park Hill. Secondly, there is the unity of performance—at all points within the main building, the same kind of structural frame supports the same kind of residential function. This does not mean that there are no expansion joints or other structural variations where needed, nor does it mean that all the apartments are identical in accommodation and aspect. But it does mean that the general nature of the building is everywhere sufficiently alike for the visitor or inhabitant to notice it, so that at points ten minutes' walking time apart one is conscious of being in the same building.

The project team at some early stage in the design decided to let this general identity of use and structure set the pattern for the exterior, and this brings up the third unity, that of detailing. The regularity of external treatment was very heavily criticized in some quarters when the designs were first published because it failed to express the individual dwellings within the block\*-from outside one can distinguish which floors are flats and which are maisonettes, but not how many bays a large or small apartment occupies along that floor. In front of the finished building this objection seems trifling, since the identity of dwellings is effectively established by the grouping of their front doors on the access side, and the project team were clearly right to go for unity and continuity of bay treatments, and for regularity of detailing throughout.

The detailing, too, has been attacked, though not in print. One must say, frankly, that some of it seems under-designed, and some of the junctions seem ill-considered—particularly where some non-repeating functional element, such as the additional external staircase in the corner of the shopping centre, has to be butted against the façade. But this, again, is a trifling objection because the scale of the detailing

School 0 AL BO ST REET

is trifling when compared with the scale of the block, which could clearly absorb downright bad detailing (which this emphatically is not) and survive. Furthermore, those who denounced the façade treatment as a compendium of current clichés when the design was first published must eat their words now, for the finished result seems remarkably free from fashiony touches, and is curiously dateless in its detailing. Again, some of these details seem entirely praiseworthy, notably the standard pre-cast balustrading in bay-wide units which, with its double top rail, is strong enough visually to stand up as a unit in the façade pattern, massive enough when viewed from inside the block to give a sense of security, yet not so lumpish as to block the view outwards too much.

[continued on page 409

Diagrammatic plan of the Park Hill layout—north is at the top of the page, and the ground falls in that direction (see 1, opposite). In this plan, the block itself is seen only in outline, and the very thick black line on one side of the block represents (to correct width to scale) a typical street deck, threading its way through all the arms of the block. The three junction points with their bridges are shown and the lifts and stairs at the block-ends and points of junction.

<sup>\*</sup> Cf. Architectural Design, June, 1955, page 192.





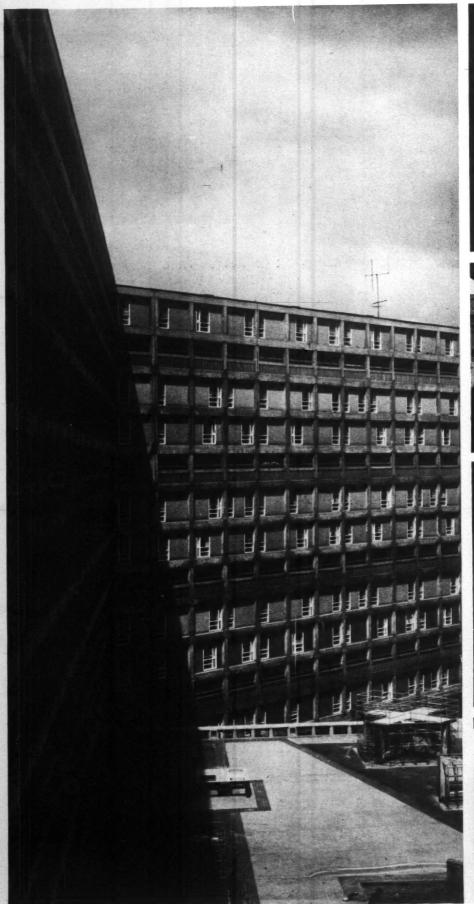


1, Park Hill from the air, looking north-east toward the Sheaf Valley. The nearest limb of the building is of only four storeys at the top left-hand corner of the picture it is fourteen.

 $2, a\ view, during\ construction,\ of\ the\ block\ as\ seen\ from\ the\ other\ side\ of\ the\ valley,\ showing\ its\ wall-like\ presentation\ toward\ the\ town.$ 

Park Hill housing, Sheffield



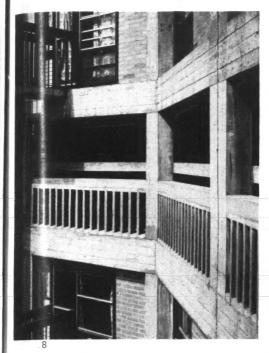


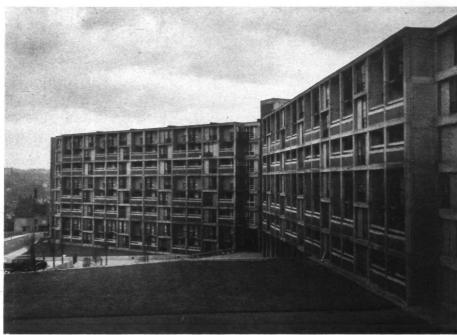












3 (opposite), internal or 'courtyard' view of the deck side of the block—the small windows on this side serve the bedrooms of the apartments. In the foreground, one of the children's playgrounds at ground-level.

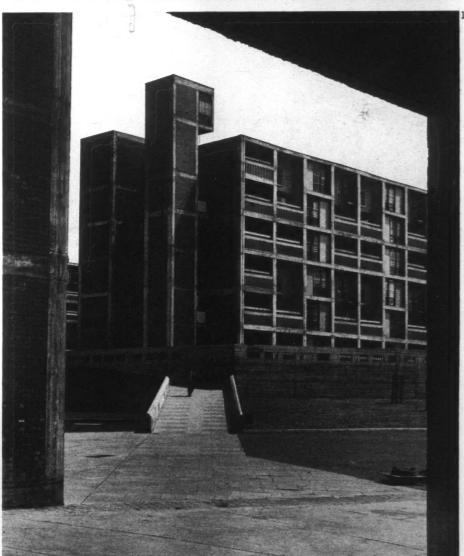
4, 5, 6, 7, four deckscapes at Park Hill: 4 is a point of transference, where the street-deck penetrates through to the other side of the block; the others show front-door details, the manner of handling bends, and typical uses (and users) of the decks.

8, exterior view at 4, showing typical external details in pre-cast and insitu concrete, metal and brick. The seemingly 'under-designed' quality of some elements is in contrast with the unassuming vigour of the concrete work.

9, external, or 'town' view of the block near the middle of the site—on this face at this point are living rooms and kitchens and their balconies as well as bedrooms on the upper floors of maisonettes.

10, internal townscape, looking towards one end of the block, from the portico underneath another part of the building—a view entirely framed in elements of Park Hill.

11, view over a deck bridge toward the vehicle lift in the facing block—the treatment is identically symmetrical at all three bridges







#### Park Hill housing, Sheffield

12, the most elaborate, and most northerly, bridging point, with three levels of decks spanning the interruption in the block. The Mondriaanesque windscreens by the lifts are conspicuous in this view, as is the old school in the background, which is to be replaced by a new school on the same site.

13, the shopping centre at the north end of the site—some of the shops are under the block, others in the independent pavilions seen here.

14, 15, 16, Park Hill floorscapes: 14, steps down to shopping-centre, with grass reinforced by concrete units at right, to accept the weight of fire-engines, etc.; 15, the main central path, which makes its way up the site from north to south; 16, the portico where a street-deck runs out to ground-level.





13





15





continued from page 404]

But to return to the three unities (which, to say it again, are hardly those of Aristotle). Their effect together is more than the sum of the three. They combine in the specific unity of a particular building, Park Hill, so that when one looks out from some part of it and sees another of its limbs swinging across the view, the effect is like that of suddenly realizing that the railway lines on the other side of some valley in Switzerland are the same that one's own train has just traversed a few moments before. But the simile cuts closer; the chances are that the vantage point from which the other limb is viewed will be on one of Park Hill's much discussed street-decks, and that what one recognizes on the other side of the site is not merely another street-deck, but another part of the same street-deck, another part of the same built volume as the viewer himself occupies.

For the ultimate unity of Park Hill depends on the inviolate continuity of horizontal communications; the street-decks make it possible to walk to any other point on the same floor level without ever having to go down to ground and come up again. But these decks are more than glorified access balconies. Their width is sufficient to accommodate children's games and small wheeled vehicles for deliveries and furniture removals, they gather up all the entrances to flats and maisonettes, and tenants' addresses are quoted by a number on a particular named deck. Functionally and socially they are streets without the menace of through vehicular traffic, and a lively argument is developing, and will continue, about the social function in particular-whether it works, whether it is worth having-because here the scheme is certainly programmatic. It set out to create a certain kind of social relationship, snobbishly decried by the TCPA Journal\* as 'Matiness,' and this is one of the points by which it must ultimately be judged.

But by qualified social scientists, not by me. The business in hand here is to discuss its architectural qualities—qualities which have been somewhat obscured by the tendency of critics and polemicists to concentrate, so far, on the question of who invented street-decks in the first place. This matter (which will be discussed later) seems to be of marginal significance when compared to the feat of building them first, on this very grand scale, and with complete success and conviction—and not as a clipped-on gimmick but as something integrally part of the whole architectural conception.

As an access system, each deck serves a storey of flats below deck, and maisonettes at deck-level rising into the storey above, and each deck, except the highest, runs out to ground level at some point up the rise of the site—the roof-line is at the same level throughout the building, but the rise of the ground reduces the number of storeys from fourteen at the low end of the site to four at the top. But the deck system is more profoundly involved with the design of the apartments than this, since it is a rule, throughout the building, that living rooms shall have the preferred, sunward aspect, and the deck be on the other, bedroom side. Since the building changes direction several times, the deck, on almost as many occasions, has to change from one side of the block to the otherhence the observation that the building has two façades (public and private, so to speak) not always on the same side. But the logic of the situation also requires that the deck will change sides mainly at points where the regular rectilinear structure of the block has to be deformed to accommodate the bend, and thus the penetrations of the deck through the building are usually associated with a split-open version of the H-plan stair-duct that forms the main internal load-bearing member throughout the structure. As a result these penetrations are not just rectangular passages, but polygonal public places interrupting the regular run of the decks, and preparing the street-deck stroller for a change from an 'outside' view over the city to an 'inside' view into one of the interior green spaces of Park Hill, or vice versa, Thus, while the deck never offers grandiose perspectives, but keeps down to a domestic scale of views along its length, the act of walking along one is a serial scenic experience, punctuated by irregular spatial constrictions, that is continuously fascinat-

This system of minor architectural punctuations is itself interrupted by more emphatic punctuations—full stops and semi-colons, so to speak, among the commas. The full stops are clear and straightforward enough; at each of the five ends of the block the street-decks expand into small public places running the full width of the structure, serving as a landing for the escape stair and a 'bus-stop' for the lifts. These two vertical circulations

BED RM BATH WC BED RM

DECK HALL DINING RITCHEN

BED RM BATH DINING RITCHEN

Section through one three-storey layer of Park Hull, showing the maisonette, above, and the flat, below, wrapped round on street-deck which serves the front halls of both.

are each housed in what appear from most ground-level views to be uninterrupted brick ducts standing side by side and effectively terminating the pattern of the façade. The semi-colons, however, are a different matter. At three points on each deck, the pedestrian, finding himself at an apparent full stop, will discover that a bridge leaps away between the two vertical ducts and connects to further extensions of the street-deck running to left and right beyond. Furthermore, he finds himself facing an exactly symmetrical composition, with a large service lift (for vehicles, etc.) exactly on the axis of the bridge.

These three points of intersection are identical on plan, all perfectly symmetrical with the three limbs meeting at angles of 112½°/135°/112½°. They arise so naturally from the general planning that their formality is not noticed at first, and I cannot see personally that the aesthetics of the whole scheme would be noticeably impaired if the three limbs met at any other combination of angles, provided they were obtuse. But symmetrical they are, and they make it clear that there must always have been some quantum of formalist intention from the very inception of the design.

Indeed, this intention was institutionally and administratively recognized in the retention of the Constructionist sculptor. John Forrester, as a kind of aesthetic consultant to the project team in the early stages, and many details, particularly of the façade treatment (relationship of planes of brick, concrete, etc.) were resolved with his advice. Purists will doubtless wince at the thought of an aesthetic consultant guiding the architect's hands in moments of indecision, but Forrester's presence on the project team at all reflects a most extraordinary broadmindedness on the part of the city authorities who budgeted for him, and remarkable enterprise on the part of the city architect who employed him. After which it may seem both captious and ungracious to suggest that his presence was not everywhere beneficial, even though one also says that the most obvious evidences of his contribution - the Mondriaanesque windscreens by the lift entrances—do less than justice to his capacities as a designer.

Nevertheless, at these three crucial points of intersection, I cannot help feeling that Forrester's presence may have involved the project team in rather passé Constructionist programmes of 'Integration of the Arts,' when they had much more creative and exciting possibilities at hand, arising from their own architectural intentions. The touch of formality at the intersections suggests that the crucial importance of these passages to the whole design was felt by the project team, but it is

expressed by something else, by the bridges themselves. Viewed from the ground, or from other parts of the building, their visual importance is overwhelming. Surprising as it may seem, they assume complete architectural dominance over the vertical ducts of lifts and stairs, however powerful these may appear when they are not in visual competition with the bridges, and their dominance makes clear, as nothing else does, the horizontal continuity of the whole building. The functional reason for these bridges is to make clearance for service roads entering the site, but the effect is not of connections between independent blocks of flats; rather, one sees and feels a continuous building which at these points has been pared down to its bare essentials, to communications that are more basic to the whole design than even the structural skeleton.

Now the strength of this effect comes largely from the starkness of its expression -the first model had weather canopies over each bridge, with intermediate supports, and this, I am sure, would have muffed the whole effect. The reason why these plain concrete trough-beams are so immediately effective in conveying the idea of communicative continuity lies, in some way, in their visual relationship to the well-known photographs of the breakdown model of the Unité at Marseilles,\* in which blocks representing the duplex apartments are shown being threaded into the frame, and around a cardboard duct, representing the rue intérieure, which projects from the end of the assembly in much the same way as do the deck bridges at Park Hill.

It seems unlikely that the project team simply took over a visual effect from this photograph, but the fact remains that they are members of a generation that has never recovered from the impact of the Unité, and, furthermore, the idea of the rue intérieure, borrowed from Corb, is one of the few influences that was admitted by Park Hill's defenders during the early disputes about who thought of it first.† These street-decks are rues intérieures in so far as they are within the frame of the block and partly wrapped round by the maisonettes, but in being at the side of the building and open to the air, they approximate to an English tradition that runs from the Chester Rows to the Stirling and Gow an housing in Preston, by way of many spec-built terraces of shops which have access decks at first floor level, over the sales area.

More immediately to the point, however, is a development visible among student designs in the very early Fifties, in which some form of continuous horizontal circulation at high levels, with public spaces

at intersections, was more or less de rigueur in all projects for high-density housing, and was finally summed up in two of the unsuccessful entries in the Golden Lane competition: one by the Smithsons, by whom the term street-deck may have been coined, and another by Ivor Smith and Jack Lynn, which was instrumental in their being invited to join J. L. Womersley's then very young team at Sheffield to develop a street-deck scheme for a site there (not, originally, Park Hill).

Now, the desire to revise Corb, visible in all these projects, was part of a loosely anti-classicist movement that was to produce its most extreme manifestation in the Smithson's 'topological' project for Sheffield University as early as 1953, in which even more dramatic emphasis is laid on the exposition of circulation as the uniting factor of the design.\* But it must be remembered that the existence of this movement only appears by hindsight from a decade later, that the terms 'un-classical' or 'anti-classical' were equally retrospective, and applied by some critics and some of the architects involved to explain what they thought had been done, rather than as slogans or tenets of faith while the designing was in progress. The Smithsons did not set out to be topological, though they seemed pleased enough to discover later that this was what they had been. It is to be doubted if the Park Hill project team set out to be anti-classical (the author can testify from first-hand, or firstear, experience, that they were much more concerned with Constructionist Integration), and their design is not to be regarded as programmatic on that subject.

But against this, it must be noted that it is very conspicuously a child of its timethe hammer-headed lift towers standing away from the main structure are as much the indicator of a specific mental climate as was the Venetian window in its day. It represents a kind of building that a great many young architects in Britain in the early Fifties wanted to put up, and very few succeeded-the Market building in Sheffield, by Andrew Derbyshire, represents the same mood on a smaller scale, and Derbyshire, too, was in on the birth of the street-deck. Park Hill seems to represent one of those rare occasions when the intention to create a certain kind of architecture happens to encounter a programme and a site that can hardly be dealt with in any other way, and the result has the clarity that only arises when—as in the Villa Rotonda—aesthetic programme and functional opportunity meet and are instantly fused. But what Park Hill abundantly demonstrates is that there are other kinds of architectural clarity besides the Classical.

<sup>\*</sup> Le Corbusier 1910-1960, page 154.

<sup>+</sup> Architectural Perign, August 1955, page 7.

<sup>\*</sup> Cf. THE ARCHITECTURAL REVIEW, December 1955, page 360.





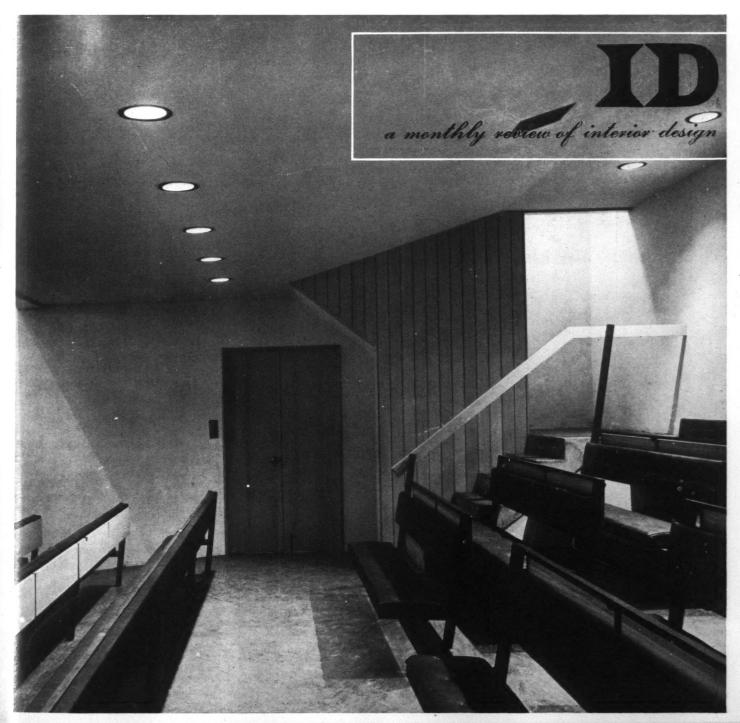
# Lecture Hall in Oxford Museum

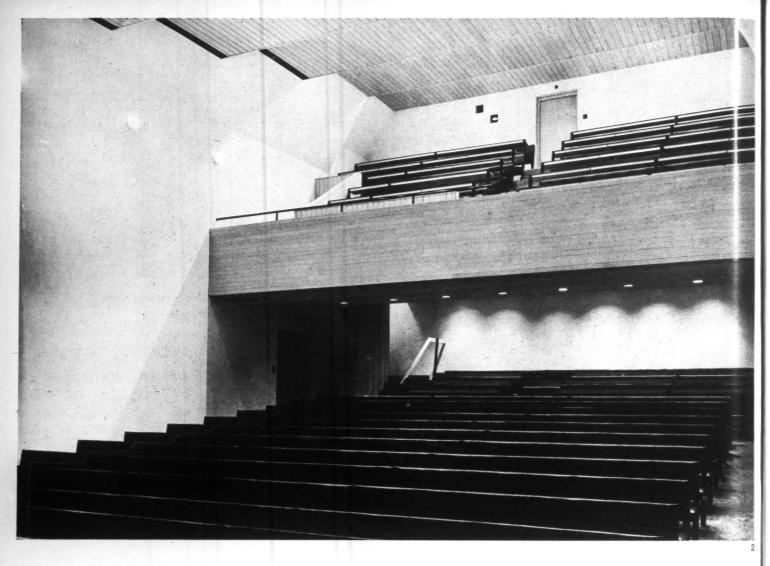
designer: J. R. Lankester, Surveyor to the University.

The need for expanding lecture accommodation is common to most British Universities at present, but extra space is not often made, as here, by rearranging an existing lecture theatre. Even more rarely sit made by altering a building that has some claims to being a monument in the distory of taste, even if it is no great masterpiece of architecture. Nevertheless, he name of John Ruskin, as the guiding denius behind the original architects of

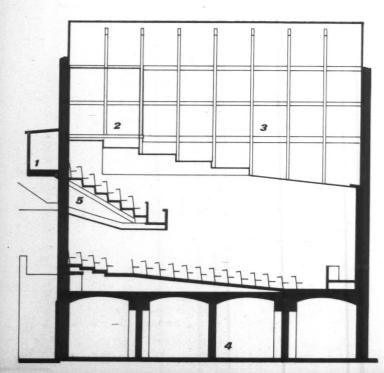
the Oxford Museum, Deane and Woodward, has not deterred the University Surveyor's Office from undertaking a complete gutting, re-orientation and redesign of the Museum's lecture theatre in a style that is closely related to their admirable Functional Traditional manner, previously seen in their Malthouse conversion (AR, April 1960). As the illustrations show, the result fully justifies their temerity.

1, looking towards the new entrance, and steps to the balcony inserted across one end of the original theatre. The walls are finished in white cement paint and the seats are upholstered in blue plastic hide.





Lecture Hall, Oxford



longitudinal section through the converted half

key

I, new projection booth

2, ventilating plant above
new ceiling

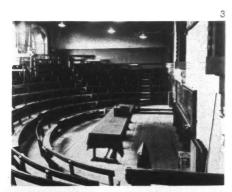
3, void of original roof

4, original cellars (structurally
reinforced)

5, new balcony

2, looking toward the rear of the hall, showing the stepped-up ceiling and the rake of the seats on the balcony. The provision of seats in straight rows, plus the addition of the balcony, instead of the amphitheatre arrangement of the old hall (3, below) has increased the seating capacity from 300 to  $400. \ \mbox{The}$  balcony structure is in steel, with a front of quarter-sawn Columbian pine. and the ceiling is planked in the same material.

3, the appearance of the hall before conversion, looking in the same direction as 2. but from a high standpoint that no longer exists.





4, the demonstrator's end of the new hall. The end wall is completely covered by a large revolving blackboard, while the demonstration bench is built of two-inch engineering bricks and is fitted with basic equipment suitable for use by lecturers in a number of subjects. No special surfacing materials, such as absorbents, have been applied to the walls for acoustical reasons, and, although the occupancy varies from maximum capacity down to about forty students, no acoustic difficulties have been encountered.

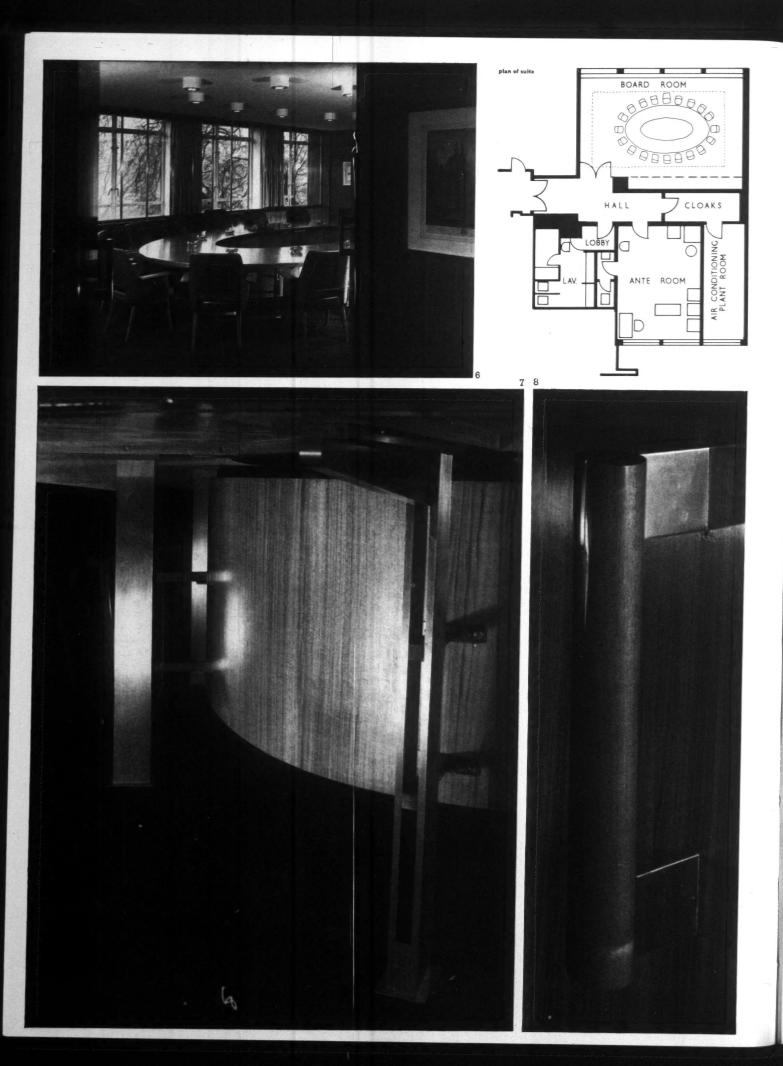
# Boardroom Suite in Knightsbridge

designer: Misha Black associated architect: Christine Durrell (both of Design Research Unit).

Executive accommodation in structures originally designed as bulk office space requires, in most cases, improvements in all aspects of the given environment, however satisfactory it may be as general office accommodation. In this suite for British Nylon Spinners in Bowater House, one of the best post-war office buildings in London, not only have standards of finish and furnishing been raised, but also those of environmental controls such as sound-proofing, lighting and air-conditioning equipment.

, view into the suite from the entrance; he walls, panelled in French walnut, and sea-weed green carpet, anticipate the clours and character of the board-room proper. Door into the ante-room on the cight, into cloak-room at the end of this executive corridor.





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Boardroom Suite

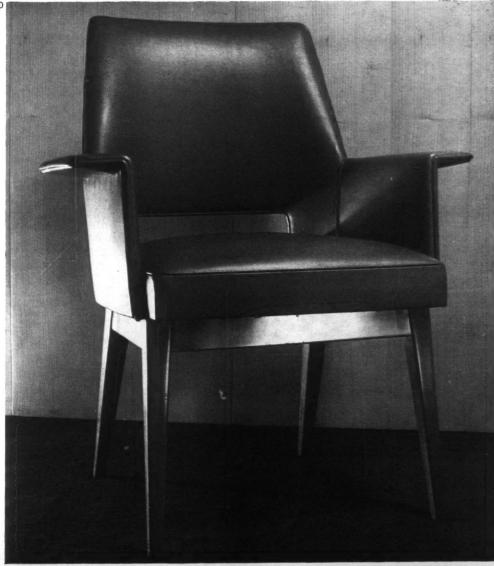
6 (opposite), a view into the board-room from the corridor, The glass screen over the windows provides effective double-glazing for improved sound-proofing. The directional light-fittings in the ceiling follow the elliptical plan of the table which they illuminate. Curtains of blue Thai silk.

7. detail of the stainless steel legs and brackets that support the board-room table (assistant designer, Philip Lacey). The top is walnut, as is the veneering of the 'skirt' carried on brackets from the back of the legs. The table, which is a little over seventeen feet by ten feet, seats a maximum of twenty persons.

8, typical door-pull for entrance and boardroom doors. The turned walnut handle is slotted over stainless steel shanks, secretfixed to the door.

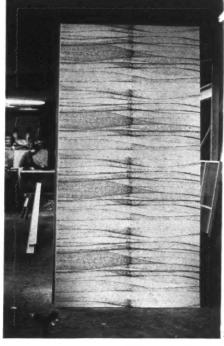
9, door-knob of the type used on the other doors in the corridor; elliptical in section, it is turned from walnut and also carried in stainless steel plates.

10, board-room chair, purpose-designed by Misha Black. The legs are in walnut, the tails in stainless steel and the upholstery in grey leather.









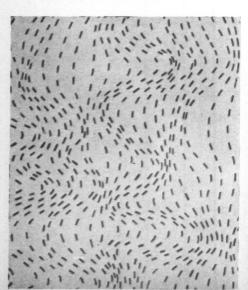
#### Large Scale Laminates

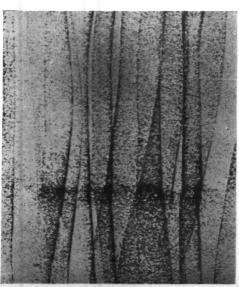
Until recently, the kind of patterned laminated boards available on the market suffered from two outstanding defects as materials for exterior use. One was that, even when the board was stable and resistant to weathering, the colours were not fast in sunlight. The other, that the patterns, though adequate in scale for interior work, were too small to read even

as texture in exterior situations. Formica's new 'Architectural Range' of laminates has overcome the colour-fastness problem (all colourways are good for ten years, which is sufficient—for most of the situations in which it will be used) and some, at least, of the patterns answer the visual problem. Their use is to be restricted to architects and interior designers.

1, close up of part of the pattern Tobacco; two repeats of this running foliage design occupy the full width of a four-foot panel.
2, one standard eight-foot by four-foot panel from the Architectural Range, showing the size of the pattern repeats.

3, 4, 5, three sample patterns (3, Strata; 4, Current; 5, Horizons) shown as they would appear with the main dimension of the panel laid horizontally, as it might be in spandrel-panels, etc. All are shown to approximately the same scale, which may be judged by the hand, in 5, or by comparing 4 and 2.







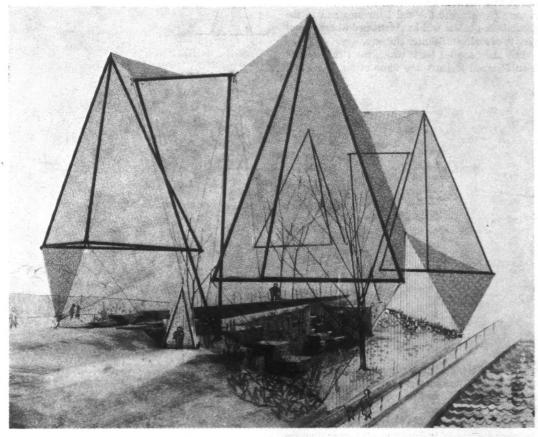




#### AVEARY AT THE LONDON ZOO

designers: The Earl of Snowdon Cedric Price

consulting engineer: Frank Newby



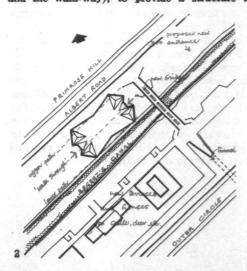
1, (right) the aviary as it will appear from the canal-side path, looking west—see site plan below, 2.

This will be one of the first structures to be erected as part of the general replanning and reconstruction of the Royal Zoological Society's gardens in Regent's Park, the plans of which have been prepared by Sir Hugh Casson in association with F. A. Stenglehofen, the Society's architect. The aviary, 1, is in the North Garden, between the canal and Prince Albert Road (see plan, 2, below), in the area of which Mr. Peter Shepheard is designing the landscape and several canal-side buildings.

The aviary, which measures 150 ft. by 63 ft. at ground level and has a maximum height of 90 ft., is to contain birds from temperate and sub-tropical regions. These will include sacred ibises, demoiselle cranes, blue pie, small gulls, large terns, guillemots, choughs, lesser flamingoes, jay thrushes, wading birds, perching ducks and herons. It will be the first open-air aviary at the London Zoo to which visitors have access.

The following points were considered essential when the design was being made: to obtain the maximum volume of usable enclosed space that the site would allow: to cater for all the activities of the birds exhibited in the aviary—nesting, breeding, perching, washing, feeding, etc.; to provide sufficient

sheltered areas for the birds while allowing the public to observe them—see diagram 4—from both inside and outside the aviary (this is made possible by two chain-link entrance curtains, 3, through which visitors can pass but which birds will not penetrate, and the walk-way); to provide a structure and

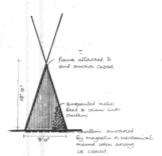


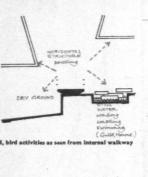
#### PREVIEW

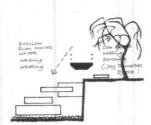
ground-works requiring minimum maintenance; to give the aviary a recognizable form when seen (both inside and outside the Zoo) from a distance at which the birds themselves are not visible.

The structural system resulting from the above requirements is shown in diagram 5. The choice of aluminium was influenced by the Zoo's request for a maintenance-free structure. The space-frame ties (for reasons of clarity only the end tie is shown at left in diagram 5) distribute the loads from the suspension cables to the end buttresses and to the ground. The cables will be prestressed where necessary to provide anti-flutter stiffness.

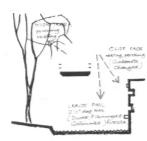
The main applied loads which the structure has been designed to carry are those of ice, snow and 3, the carry are those of ice, snow and antrance

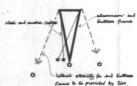


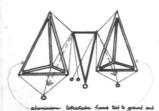


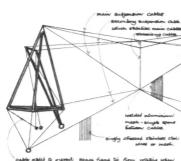






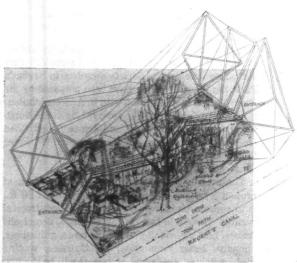






wind, snow being included because in those areas of mesh which are almost horizontal it is possible for the wires when iced to collect snow. The possibility of de-icing the mesh to eliminate ice and snow loading was investigated but was found uneconomic. As snow loading is, however, much higher than ice loading various methods are still being investigated to eliminate or minimize the collection of snow on the mesh, which is of 10 gauge, 6 in. by 11 in. black anodized aluminium. To date, a simple laying of surface heating cables on the mesh appears to be most feasible. If this method is followed, the structure will be designed to carry ice loading of approxi-

mately 1 lb. per sq. ft. and no snow loading. The wind loading on the mesh is being investigated by wind-tunnel tests. A model of the whole structure with mesh covering is also being windtunnel tested for wind stability. The welded aluminium mesh, as well as the chain link entrance curtain already referred to, is being tested at the Zoo for bird penetration. A plant-room under the waterfall contains the recirculating pump for all the water, together with plant for the four hydrants located one under each end frame.



6, sketch showing the internal layout and landscaping of the aviary, with

percelling white or the rule or reider against free







1, the close-up of the storage garage at Longbridge; the cladding is plastic-faced embossed aluminium. 2, distant view.

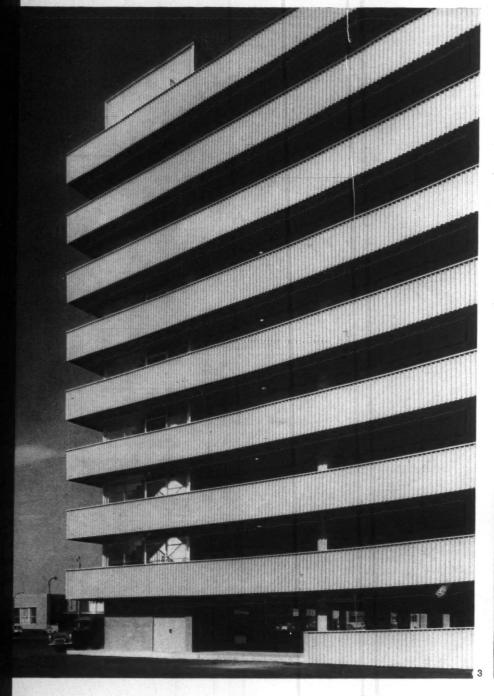
### 1, at Longbridge, Birmingham

ARCHITECTS: HARRY W. WEEDON & PARTNERS



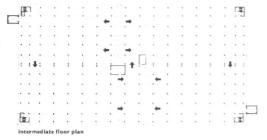
The expansion of the Austin factory into the available storage space for newly-manufactured cars, created the need for a storage garage to absorb an increased output on a smaller area of ground. The solution adopted is a split-ramp system, with parking on the ramps, each of which occupies half the full width of the structure, with flat areas only at the end and centre turn-rounds. The great length of the site enabled the ramps to rise at a sufficiently gentle angle without abnormally low floorheights and—since the cars will be driven by works





drivers—it was possible to go up to a greater height (eight full storeys) than in drive-yourself parks for non-professionals. Although the capacity is the largest of any multi-storey garage in the world—3,000 cars—and there is no problem of peak operating periods, as in normal parking, half the garage can be emptied in thirty minutes in case of emergency.

The construction is in flat-plate concrete floor slabs, probably the largest structure ever to be slab-lifted with tilted floors—the total height was so great that the columns had to be raised in two pieces. The exterior is partly enclosed by means of a light balustrading of plastic-faced, embossed aluminium sheeting that follows the line of the slab edges. Car lifts are provided to reduce the time in reaching the three upper floors (the drive, by ramp, is half-a-mile from entrance to top) and other ancillary services include passenger lifts for drivers, access and escape stairs, lavatories and a tea-bar.



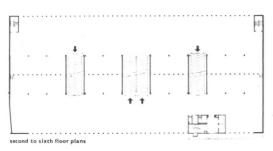
3, one of the corner staircase shafts. 4, typical parking floor, showing crash barriers.

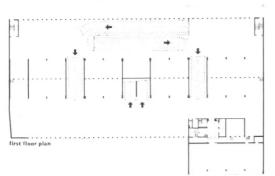


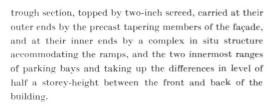
# 2, at Aldersgate, London ARCHITECTS: OSCAR GARRY & PARTNERS

A multi-storey drive-up parking-garage with accommodation for a peak load of nearly seven-hundred cars, with a filling station in the forecourt and adjoining offices for rent to firms in related businesses, has been fitted into a cramped site in Aldersgate Street almost opposite the western end of the new Route Eleven (London Wall). The parking area, disposed on eleven half-floors (in order to keep ramp-lengths to reasonable minimum of length and gradient) is operated on a self-service system devised

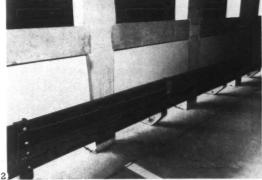
by the American company who are the concessionaires—access is direct and without control from the street, but cars cannot be reclaimed without presenting a ticket which was obtained at the time of parking. Access to the parking floors is by scissored ramps from ground level, and there is a special parking floor, with extra head-room for commercial vehicles, in the basement. Construction to first floor level is by in-situ reinforced concrete, and above that the floors are of deep precast beams of inverted











1, typical half-floor parking bays. 2, protective barrier. 3, the main façade facing Aldersgate Street.



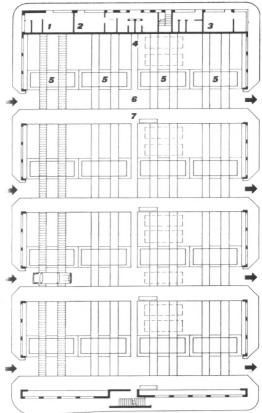
## 3, at Southwark Bridge, London

ARCHITECTS: C. EDMUND WILFORD AND SON

In contrast to any other urban parking garage in Britain to date, this one has a fully automatic mechanical handling installation (Zidpark system), in which cars are raised and lowered on lifts, and transferred sideways in the horizontal plane by rollers at a maximum rate of twelve cars per minute, the whole operation being controlled from centrally placed consoles in each access way—no human foot need







ground floor plan 1, female staff. 2, male staff. 3, waiting room. 4, walk way. 5, lifts, 6, driveway. 7, footway.

Opposite: 1, distant view with the River Thames behind. 2, close-up view. 3, one of the control consoles on the ground floor. 4, the rollers which carry\_the cars. 5, detail of the façade.



be set on the upper floors except for maintenance. The 'St. Paul's ceiling' affects the site, which adjoins Lower Thames Street, and the height of the garage block is therefore restricted to eighty feet above datum. Nevertheless, eight parking floors have been accommodated, housing 464 cars, while another forty-odd vehicles can be disposed in various parts of the ground floor for peak loads (one parking floor is below ground level).

Construction is a bolted steel frame (which needs no freproof casing because the exterior is more than fifty per cent open) resting on a concrete basement carried on 100 concrete shell piles. The external screening, which is per purely visual functions, consists of V-section steel fins, clastic faced and carried at twenty-inch centres. At ground evel the installation is surrounded by a security wall of prickwork and open louvres, and the access ways can be losed off by means of folding steel gates. On the side towards Lower Thames Street are a suite of offices, savatories, etc., at ground level, and a large filling station.





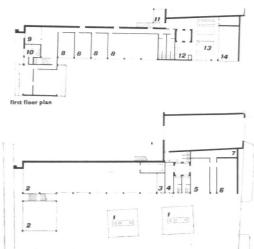


1, the projecting showroom, with the directors' suite above. 2, looking along the forecourt past the lubrication bay.

# 4, at Leyton, London ARCHITECTS: CHALLEN AND FLOYD

On a site facing the open courtyard of a Victorian Almshouse, in Lea Bridge Road, these extensions to an existing transport-depot provide office space for a haulage business, a canteen, showrooms and a complete service station with washing and lubricating installations and two pumpislands in the forecourt. The construction of the two-storey building is steel-framed with concrete fire-proofing cover, and the floor and roof carried on wooden joists. The showroom and service facilities occupy most of the ground floor of this structure, while the upper floor is occupied by the canteen, offices and directors' suite. All exposed concrete is fair-faced, the glazing of the ground floor consisting chiefly of storey-height plate glass in fixed and sliding frames while the upper floor has patent glazing with opening lights, except where these are replaced by louvres (directors' office) or horizontal boarding (food-preparation areas and lavatories). The back wall of the showroom is in fair-face brick, while office partition walls are of concrete blocks plastered and painted white. The forecourt is paved in six-inch concrete slab, except for the area in front of the projecting showroom, which has two-inch precast paving slabs and the pump-islands which are in black granolithic with concrete kerbs.





ground floor plan

staff r

9, recept on

II. foreman

12, food preparation

13, canteen
14, upper part of lubrication
bay

# EXHIBITIONS

PAINTING

Magritte's poetic insight operates at cultural level so disconcertingly low and in terms of an illusionism so rutally utilitarian that the only people sho are not reluctant to admire him are hose who believe—and know—that octry is not necessarily committed to art.

Magritte's insights take the form of okes. They are at their best and most powerful when they are an insult to our intelligence and emerge on to the canvas without betraying any sign of an artistic purpose. He hasn't set himself a light task; he doesn't find it easy to reach rock bottom, and he has many failures. He has to demand from the act of painting a totally abject devotion to the mechanics of the joke he is perpetrating. The draughtsmanship has to be inert, the colour dull and glum, and the illusionist technique so devoid of distinction that it can make a landscape as mean and commonplace as a piece of cheese in a third-rate Flemish trompe l'oeil. When all these factors are in harmony the joke is so devastatingly obvious that it registers as a sudden giddiness.

Neither of the two exhibitions of his work which opened in London on the same day a few weeks back were entirely satisfactory, and I don't think they would have been any more satisfactory if they had been joined together. But in their different ways they have helped to clear the ground for a museum exhibition devoted only to his successful works. Provided that all the owners would lend, it would not be difficult to decide upon the selection. In this sense, Magritte has placed himself in a peculiarly exposed position. His best works set standards of clarity and hallucination by which the others are almost automatically condemned. Even people unfamiliar with modern art could soon learn to tell a good Magritte from a bad one with as much assurance as their grandfathers passed udgment on academic drawings of the ude. The fact that his best work offers no esistance to dull eyes suggests that he ught to be the most popular artist alive, nd it would be fascinating if the matter ould be put to the test in a public gallery.

The exhibition at the Grosvenor Gallery ontained many early works and they nade it abundantly clear that it was in the paintings of Chirico's visionary period





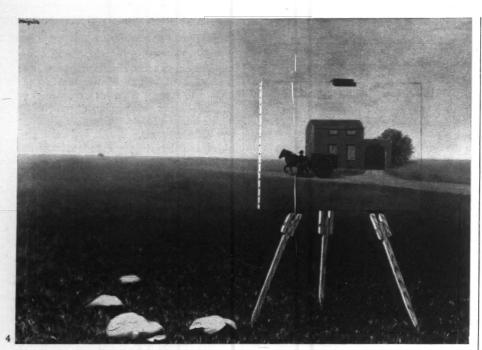
(1910-1917) that Magritte found the signposts to his own unique territory. But art
is Magritte's worst enemy and his attempts
to wrestle with Chirico's pictorial system
led to abominable pastiches and incoherent picture-making, as in the painting
containing the fretwork 'philosopher,' 1.
This picture provides evidence enough
that Magritte was thoroughly aware of the
latent content of Chirico's images, but the
influence of Chirico's compositional devices
has produced only a kind of lumber room
of Freudian props.

In a picture painted a year earlier, in 1925, entitled 'Le Conquérant,' 2, exhibited at the same gallery, the influence of Chirico is no less evident, but it's a psychic influence rather than a pictorial one. Magritte learnt from Chirico's 'The Jewish Angel,' in which a head is composed of a fragment of a shadowy arcade topped by a black wig, that almost anything could be used as a stand-in for the human head. His wooden plank in 'Le Conquérant,' made even more horrible by the effect of applied graining, brusquely divests the idea of the romantic associations it had in the Chirico, and although

the illusionist technique is nowhere near perfection, it is one of the first of his images to emerge from his exploration of the possibility of producing an image which is not only a substitute for the head but a substitute for the kind of impassive object that has the power to frighten us in dreams. It's also a clumsy prophecy of the terrible image of displacement which he called 'The Rape,' where a girl's head is composed of her body, with breasts for eyes, a navel marking the place where the nose should be and the uncovered sex forming a nightmarishly poignant effect of a puritanical pursing of the mouth. This picture was lent to the Grosvenor Gallery show by George Melly, along with a painting called 'The Black Flag' which is one of the best Magrittes I know. It depicts a night sky filled with antiquated aeroplanes whizzing about in all directions without pilots. It contains the notion of a visitation from another planet worthy of Mack Sennett, but it also brings to mind the eerie, hysterical swooping of bats, and the aerial battles of demons in Bosch's Temptations. All done in glum colour and with mechanical efficiency. I'm sorry no photograph of it was available, but I can at least illustrate one example of his work which I admire without reservation. It was included in the exhibition at the Obelisk Gallery.

This was a different kind of exhibition. It included many pictures in which the images were presented in his perfected illusionist technique, but in which the frisson was weak. The sort of thing I have in mind is the dead-pan, factitious image of plants turning into night birds, 3. It's a nice joke against the metamorphic preoccupations of some of the artists of our time who are considered to be more 'creative' than Magritte, but the image doesn't really break free from nineteenthcentury gothic. Another work which was fascinating in its way and yet somehow lacked bite was the apparition in a night sky of enormous brass-band instruments which have caught fire. It would make a splendid frontispiece for an illustrated





edition of Freud's 'The Interpretation of Dreams,' for it mingles the psychoanalytical significance of dreams about flying with dream-like projections of such verbal material as 'playing one's instrument' and 'playing with fire' in a compact, concrete image. The only thing is that Magritte's best images do not rely upon the spectator to work out their meaning. They operate as if the spectator were actually dreaming.

The one truly masterly example of his joking in the Obelisk Gallery show was from his brilliant series of paintings within paintings. (The first crude sign of his interest in this theme appears in the early picture of the robed fretwork figure.) The painting of a landscape in which the canvas on the easel depicts the part of the landscape which it hides from view, 4, is a text-book demonstration of the vital role played by his devitalized illusionism in the exposition of the idea. It produces an optical magic as rich in impossible possibilities as the verbal magic of Lewis Carroll. Is there a house behind the canvas? How will the horse get on to the 'real' road when it reaches the edge of the canvas? How did it get into the canvas in the first place? Was the canvas somehow slipped into the scene the way one puts a piece of paper in the path of a crawling insect in order to carry it away? If the horse should fall when it comes to the edge will it fall into the foreground and become larger than the canvas it occupies? These are idle questions. They only tempt us to doubt reality. Let us return to the firm ground of art appreciation.

The exhibition of impressionist and post-impressionist paintings called 'Masterpieces of French Painting' which

was recently at the National Gallery, was formed by a German industrialist, Emile G. Buhrle, who died in 1956. It is a very remarkable collection to have made, considering that Buhrle only began to collect in earnest in 1938 and was concerned primarily with acquiring the works of the acknowledged masters of the most popular and most publicized school of painting the world has ever known. Perhaps it is more remarkable for the immense amount of money which must have been available than for any special sensitiveness on the part of the collector. The money came from armaments, and it's quite clear that finally there was so much of it that if Buhrle wanted something that was going he didn't have to worry about competitors. It's said in the catalogue that 'the opinions of museum officials, authoritative critics or other collectors had no real importance for him' and that he 'seldom allowed advice to influence him decisively,' but it's difficult to believe that museum officials and authoritative critics would be likely to cast doubt upon such obvious examples of the gilt-edged, unless, of course, they had some other collector in mind.

It's the kind of collection which enables the critic to strike the right note of awe simply by reciting the number of Cézannes it contains, and the number of Van Goghs and Manets and Monets and Renoirs. I realize now that my four illustrations must have been chosen compulsively, for I can find no trace of system in it and it includes nothing by the artists I have mentioned.

The writer of the catalogue notes says truly of Corot's fair haired girl in a red dress, 5, that it is 'neither a portrait nor a genre piece but a subtle poetic image

evoking a mood of calm, contemplation and melancholy,' but it seems unnecessary to have added, after noting the relationship with the art of Vermeer, that it is 'free from the Dutchman's descriptive and narrative detail.' The use of the word 'free,' and even of the word 'Dutchman,' seems to carry the absurd implication that it is an *improvement* on Vermeer.

The Degas study of Vicomte Lepic and his daughters, 6, is a nice example of his play with the idea of informality. I fancy that I chose it partly because I like little girls and partly because it is a reminder of the same painter's marvellous 'Place de la Concorde,' where Lepic and his daughters, three or four years older, occupy the foreground.

The Rouault called 'A Couple,' 7, painted in 1905, is a work of his greatest period. His art strikes me as having grown lighter with the passing of the years. What once seemed to be a tragic awareness of sin and damnation now seems to me to be a kind of exquisite brutalism, as if the influence of his master, Gustav Moreau, were working its way, twisted and distorted, to the surface.

The fact that Gustav Moreau himself is once again being taken seriously, and Salome in all her flashing jewels is knocking







on the doors of authoritative critics, is a natural consequence of the steadily deepening regard for the art of Odilon Redon. It is a sign that Redon is now a fully-fledged and officially acknowledged French Master that one of his pastels is in the Buhrle collection. But it is not surprising that it stands out rather sharply from the other masterpieces around it, for this superbly



visionary and poetic work, 8 (it's called 'Drifting') speaks up for what has been for too long a suppressed minority. Redon's work springs from an attitude to reality absolutely opposed to that of the impressionists. This attitude was expressed by Moreau, and subsequently echoed by Chirico, in the words 'I believe only in what I do not see,' and by Redon himself when he said 'My whole originality consists in putting the logic of the visible at the service of the invisible.' This is also precise explanation of the aims of Magritte, and for the first time in my life I would like to write a manifesto. Its title would be: 'Independant Visionaries of the World, Unite!'

Robert Melville

# TOWNSCAPE

DERBY MARKET PLACE

Derby . . . . the most Midland of all cities, bricky and slaty from the air, with a purple haze almost like an aura. Saturday night and Monday morning, here. Circle it, like the beginning of an esoteric film, and you pick out a tiny central square, 1, lost by comparison with the roundabout and the civic improvements, full of cars and buses. Funny fagend of a pre-technological age, you may think, I wonder what that's like.

Go down and have a look, and it turns out to be still, in spite of the attempts at Civic Centres, the centre of gravity of Derby. Also, in spite of the slate and red brick, it manages to feel incredibly Continental—because enough people always want to congregate and feel themselves at the centre of things, whether it is in Derby or Siena.

One kind of reaction made the floral roundabouts and the pseudo-avenues.

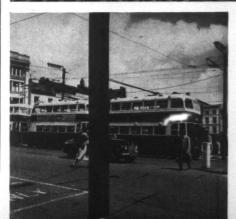
Another, very naturally reacting against this, would want the whole of Derby Market Place pedestrian. Leisured ease, reflections of Venice, no horrible motorcars. The truth, yet not the whole truth. That is something here much more intricate and subtle, which may be true for Derby, but for nowhere else.

Derby Market Place is unusual, in Britain. It is a miniature of the Brussels *Grand' Place*, a place which draws its life from the coming-and-going. A6, from London to Manchester, runs up one side of it, and traffic is continually on the move, both local and national, 2. The trouble is that the balance is all wrong. There is



Map showing location of Derby Market Place (circled in 1 below). Compare with map on page 429.

















nothing left but the traffic and its appurtenances in the way of street-furniture and parked cars, 3. And in the way that English provincial towns have, it is beginning to lose its buildings like a middle-aged business man loses hair There is already a gap on the east side which would have to be filled before it began to be a proper square again. To take all of the traffic out of the square would be to devitalise it: and the talk of 'opening it up to the river,' which is in the air, is simply the old roundabouts and formal axes brought up-to-date. The river at this particular point is a confusion of carparking and nondescript buildings dominated by a power station; the space would leak out irretrievably and the scale, which at the moment is just about right, would have been exploded to no purpose.

The point, of course, is to control the amount of traffic. So far, our practice has been to polarise, just as clumsily as we do in politics: Left or Right, all cars or no cars. But how about a controlled number of vehicles, a number that need not necessarily be the same as that for Nottingham or Leicester or any other place? The A6 down one side (with a bus lay-by) and about twenty parking places might fill the bill. If it did not, then it could be varied by experiment, like a chef making a sauce; the daytime parking charges could ensure the correct sort of in-and-out (first hour free, second hour 10s., third hour £2).

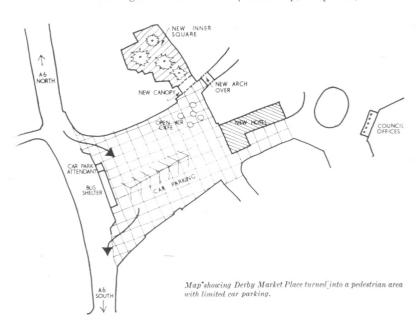
The clutter should certainly go, because the square is too small to stand it. One sweep from side to side would be ideal, whether setts, paving or squared concrete—anything to differentiate it clearly from the asphalt of A6. One object would have to remain, a single long bus-shelter, with a car-park attendant's hut built into one end. Certainly, the over-furnishing of most pedestrian squares would never work here, whether the style is 'ancient' as at Nottingham, or 'modern' as at Burslem (AR December, 1960).

What is needed is much more the simplicity of Sheep Market at Leek, 4, or the easygoing to-and-fro of a place like Newark, 5, with cars and market stalls happily nudging each other. Life is all one; any kind of segregation, except as an absolute last resort, is denying part of it. The best comparable example is at Abingdon, where market-stalls, 6, and cars, 7, happily counterchange throughout the day, and where changes of purpose are deftly expressed in the road-surface. A solution at Derby need not copy the materials but ought to copy the deftness. Derby has a big covered market, hence probably no need of open market-stalls. though the idea could be tried (if there's money in it, people will take it up; if not,

there's nothing lost). What it does need is some kind of place that can become a Speakers Corner without being labelled Speakers Corner.' When I was there, tiny neetings were trying to get going amongst the mudguards and front bumpers.

Also, obviously, people need somewhere, ang in the centre, to be able to sit down. The view of Nottingham half-an-hour

trees and seats, with a canopy across the entrance to maintain the line of the main square: an 'inside' to balance the 'outside' of the busier Market Place. This would be next to the eighteenth-century Assembly Rooms, and this corner would naturally be the pedestrian focus, with café tables and awnings, weather permitting. So the final mixed-up, empirical, this-time-only sug-



after a heavy shower, 8, shows how seats will be used regardless of how dreary the surroundings are. Derby does not possess such a place.

I have tried to show that the *genius loci* of the Derby Market Place is something different; but Derby needs both, and the sit-down square could be built next door. In the north-east corner there is a gap, 9, now used as a car park. This could become a space like a City churchyard, full of

gestion for Derby Market Place would look, in plan, like the above.

In the process the trolley-buses have disappeared, as they are likely to anyway. The bus shelter could look like those at Burslem, 10, except that it would be much longer, double-sided, and have an attendant's hut put under one end. Full Street has become pedestrian, with an arch over it, and Derwent Street has undergone a process which ought to be more





widespread and which could be called road narrowing. The aim here is to provide an oblique view of the portico of the Council Offices transforming an indigestible neo-Georgian lump into a townscape incident. The natural thing to build in the gap would seem to be an hotel, which the centre of Derby certainly needs.

The main object is to get a balance of motor and pedestrian traffic, neither nocars nor all-cars, which will meet the specific needs of this specific site. If the balance were not quite right, in either direction, it could be changed after a trial run. Traffic engineering is as subtle and



Trawings by Richard Reid illustrating Derby Market Place, 11, is it is now and, 12, how it could appear if the suggestions in an Nairn's article were to be adopted. The Assembly Rooms are in the left with the proposed new hotel on the right, giving an oblique view of the portico of the Council Offices beyond.



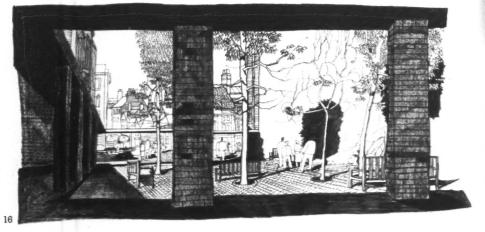
delicate an operation as a bit of brain surgery. If we are as rational and skilled as we continually boast of, let us try to use our abilities—not only in Derby, but all over the country—to define not only black and white but every conceivable shade of grey. There is no one solution, and no easy answer, only perpetually different sets of circumstances. Meanwhile, here is Richard Reid's interpretation of a possible 'before' and 'after' in Derby.

Ian Nairn

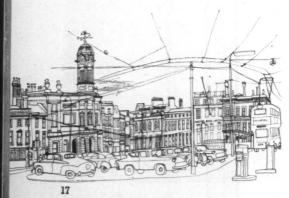








Further drawings by Richard Reid showing Derby Market Place as it is and as it could be. 13, present view from the south-nest and, 14, proposed, with the tower of the Town Hall on the right. 15, looking from the north and, 16, the proposed inner square, looking through to the main square. 17, seen from the front of the Assembly Rooms and, 18, from the same viewpoint with the proposed open-air cafe in the foreground. Two more views of the Town Hall are on the next page.





### Derby Market Place



The Market Place as it could be: 19, the Town Hall floodlit at night; 20, looking from under the Town Hall tower. See Ian Nairn's article on preceding pages.



# PLANTS

### DIEHARDS, GREY & GLAUCOUS

Many municipal and landscape planting schemes have a certain deadliness, based as they are on bare survival and stay-as-you're-planted principles. One such municipal slave is Senecio laxifolius, a woody, herbaceous ever-grey perennial of the Compositae family with silvery foliage and in mid-summer unimportant yellow daisy flowers. It grows in any soil but tends to straggle if not cut back in early spring when new growth appears.

Many of these plantings would be improved by introducing other dichards to provide either a change of leaf-tone or a contrast in leaf form. For instance, equally willing survivors in poor soil are Jerusalem Sage, *Phlomis fruticosa* and its near relation *P. chrysophylla*, 1, two woodybushy sages with a habit similar to Senecio but of a more green-grey tinge and

plates of flower in August. A silvery groundwork for these bushy plants would be *Stachys lanata* (Lambs' Tongues or Rabbits' Ears) or the silver furred *Anaphalis margaretaceae*, which makes dense small-scale mats.

I have seen one successful planting of Senecio alone at Harlow (where Sylvia Crowe is planting consultant); great wodges of these plants are set in fore-court beds, alternating along the roadway with equally dense plantings of prostrate juniper. This produces a solid textured effect.

The best contrasting plant form to use with Senecio and Sages is the Iris; not the common flag, Iris pseudacorus, which requires a damp position, but Iris ochraurea (cross between I. ochroleuca and I. aurea) which has 4-foot leaf shafts and flowers freely, yellow with deeper markings on the falls, good seedheads and grows in ordinary soil in sun. Iris pallida dalmatica is the other candidate, a valiant weed-throttler, with fragrant pale lavender flowers. It keeps the beauty of its greygreen foliage, vertical swordthrusts,



1, Phlomis\_Chrysophylla.

rougher leaf texture. The effect could be enriched by planting substantial groups of purple sage, Salvia officinalis purpurascens (atropurpurea in catalogues), though this is not quite so hardy, and attendant clumps of Achillea. A. clypeolata has fine-feathered silver leaves, and yellow

through the summer (2½ to 3 ft.). Self-seeding aquilegias (columbines) like A. alpina and A. vulgaris nivea (the grey-leaved old-fashioned Munstead White Columbine) associate well with these.

Two further things about Sage: rather like Lavenders (two of the best grey forms











2, 6, Euphorbia Wulfenii. 3, Euphorbia Robbiae. 4, a very fine-leaved Senecio, S. Cineraria 'White Diamond,' suitable only for sheltered sunny well-drained sites. 5, Euphorbia Epythymoides in April.

of these familiar-to-all plants are 'Hidcote' and Lavandula lanata) they tend to straggle if not severely clipped. The time to do this is not autumn but spring. I have pruned a ten-year-old sage into a dense deep mattress 4 ft. 6 in. by 3 ft. by 1 ft. 6 in. high. It looks good beside a bushy Euphorbia Wulfenii, 2 and 6, a glaucous green bottlebrush plant of splendid form, and a silvery cotton lavender, Santolina napolitana. This is an idea for courtyard planting. Another happy combination is purple sage with fine-leaved glaucous clumps of Rue-Ruta graveolens 'Jackman's Blue' is its best form. The metallic colour bites like a slice of Sorrentine lemon between the teeth.

In April in the Dublin Botanic Garden I was struck by the vigorous splendour of the Spurges (Euphorbias), growing in ordinary soil, then in flower. E. Wulfenii, a large succulent bush 3 ft. by 3 ft., is commonly sold by plantsmen, but the Sunningdale Nurseries, Windlesham, Surrey, have a good selection. These include E. characias, up to 4 ft. 6 in. high and wide, finer than E. Wulfenii, its flowerheads green with maroon-black eyes. E. Robbiae, 3, colonizes easily; height, 1 ft. to 1 ft. 6 in.

There is a low, dense clumpy plant, E. epythymoides (syn. E. polychroma), 5, like a rounded yellow-green dome in spring. (E. Sikkimensis and E. Griffini are both Himalayan spurges, leaf veins and stems bright red in early spring, but these are more tender gardener's, not architect's, plants). Euphorbias come into the in-

teresting category of virid-flowering plants. The Caper Spurge, *E. lathyris*, is very much for architects, with a remarkable arrangement of leaves, a startling vertical geometry. It was once a popular cottage plant biennial, seeds itself, and crops up in spring to astonish in unexpected places. I noticed it this year on Maurice Prichard's stand (Riverslea Nurseries, Christchurch, Hants). Thompson & Morgan have the seeds.

Patience Grey

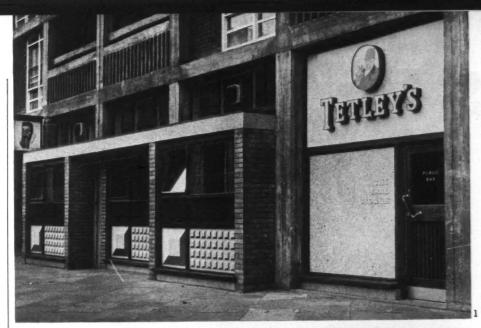
# CREDIT

PARK HILL PUBS

It is a deserved compliment to the urbane social aspirations behind the Park Hill redevelopment in Sheffield (see pages 402-410) that it should be graced with the first signs of renewed vigour in the design of streetcorner pubs. Houses like the Scottish Queen and the Earl George, 1, are no longer misquotations of the country pub style in an urban setting. These two Tetley pubs, designed by John Foster, of the Tetley organization (architect in charge, J. B. Moorhouse), in consultation with the City Architect's office, fit into the Park Hill scene not only in terms of the planning module, but also in the general feel of their external treatment with its appreciation of both the frame-and-fill tradition and the use of three-dimensional illusion.

But it is one thing to fit, and another to exploit and develop the fit, and on this score the two Tetley houses, though praiseworthy, must yield the palm to Park Hill's third pub, the Parkway, 2. Here, the frame-and-fill aesthetic has not merely been appreciated but extended and diversified in a manner that suggests that the designers, G. R. Adams and Alan Baggaley (of Hadfield, Cawkwell and Davidson) really savoured the possibilities of the commission. The use of large areas of mosaic suggests a new exterior material that can stand punishment as well as those of the pub tradition, while at the same time lending itself to pattern-making and graphic advertising—the use of bold recessed sans lettering cut into mosaic in contrast with more ornate forms in enamelled work, 3, suggests façade treatments that could be developed even further by exploiting carrent trends in graphic design.

Further development, indeed, seems to be what is most needed here. All three pubs contain so much promise that one can be prepared to excuse the occasional bults of detail that all three exhibit, in the hope that the architects will have chances to develop these beginnings. In particular, the Hope and Anchor Brew-









ery would do well to give Adams and Baggaley opportunities to spread themselves in interior work. While all three interiors suffer in varying degrees from the institutional bleakness that spoils nearly all brewers' architecture even now, the use of window-seats and the low ceiling in the *Parkway*, 4, give promise of an approach that could re-establish true pub atmosphere without period revivalism or self-consciousness.

P.R.B.

# SKILL

# WALLS, FENCES AND GATES

Outdoor space dividers play a larger part in environment than most architects recognize. This month Robert Haynes investigates the present position covering, as he does so, dividers of brick, concrete, timber, reed and iron.

The history of walls, fences and gates is as old as building itself and many of the techniques employed today have had their origins in the forgotten past. At some time or another, most building materials have been used in the construction of these elements. Some have been found unsatisfactory; those which are still in general use have passed a test, which only time and the weather could set and are assured of con-tinued employment in the future.

For the purpose of this review, walls, fences and gates will be considered generally according to the material from which they are made. There are, of course, those composite examples which confound classification, but these are so well known that it is of no great significance into which section they are placed.

A traditional material for boundary and screen walls; wide ranges of finish, texture and colour can be obtained from the use of standard bricks with variations in bond and joint treatment. The Sussex & Dorking Brick Co. markets units for use with non-load bearing screen walls. A concrete unit of similar shape made by the same organization is shown in 1. Many small brick companies will, however, make specials for solid and screen walls, provided they can be fitted into their production programme. Prices range from 50 per cent above to double the cost of the standard brick.

The use of dressed stone for free standing walls is very limited be-cause of its cost. For short lengths of walling, however, which are ex-tensions of, or closely associated with, buildings of similar character, na-tural stone is sometimes used. This may be solid or as a facing to brick or concrete block. The Stone Firms Ltd. of Bath market standard range units for Beer and Bath stones in the following sizes:

Range work is available in either sawn or knapped finishes. The same firm offers a variety of machine

### Standard Range Units for Bath Stone

Standard depth 6" Width on bed-4 Depths of 3" to 8" available Random lengths 9" to 2' long

Ashlar 8" and above

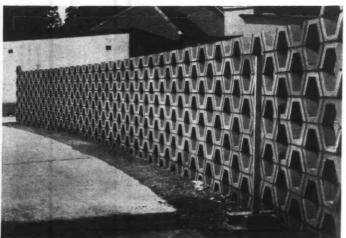
## Standard Range Units for Beer Stone

Lengths Width on bed Heights

Random from 6" to 15" 4'', unless otherwise specified  $2\frac{3}{4}'',\,5\frac{3}{4}'',\,8\frac{3}{4}''$ 

Rangework is supplied in the following percentages of wall heights:  $2\frac{3}{4}$ " 15%,  $5\frac{3}{4}$ " 40%,  $8\frac{3}{4}$ " 45%. Other percentages of heights to special order. Bed-widths and wall heights

of other than standard sizes also supplied to special order.



1, ceramic unit for non-loadbearing wall by Redland Tiles Ltd.

patterns on slabs for a very small additional cost over and above that of plain faced work.

## Concrete

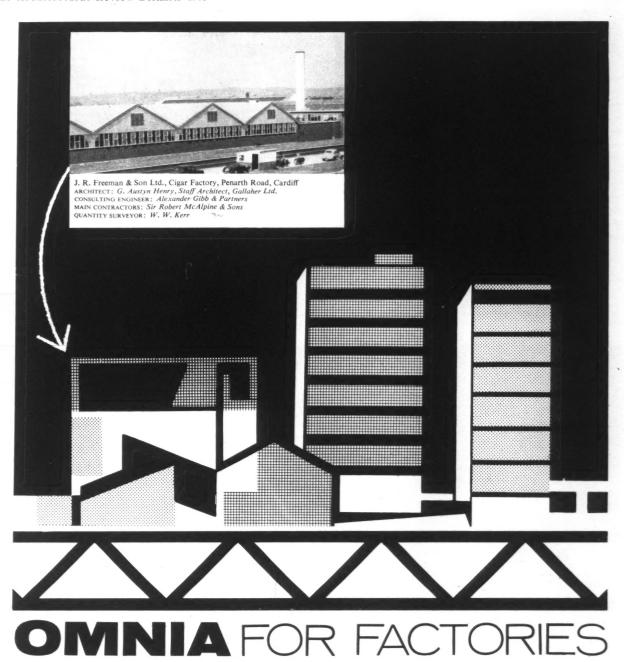
In recent vears considerable development has taken place in this material to produce new and interesting shapes and textures in both in-situ and block construction. For in-situ work, the use of green un-wrot timber shuttering to impart the texture of the wood to the surface of the concrete is well known. The aggregate transfer method was developed to give to in-situ concrete exposed aggregate finishes similar to those available on concrete blocks. The system consists of gluing aggregates to form liners and casting the concrete against these. When the liners are removed, the aggregate remains embedded in the surface of the concrete. Subsequent sand blasting, grinding, polishing or bush hammering can be carried out if desired. Another technique has been developed in which plastic moulds have been produced, against which the concrete is cast. These will impart a bold pattern to in-situ work. Satisfactory moulds have been made using various butadiene styrenes and linear polyethylenes and these can be used a number of times. Rubber sheets giving a shallower, overall pattern have also been used for this type of finish.

Concrete blocks for boundary and screen walls fall into four groups: plain blocks; profiled blocks; pierce l blocks and exposed aggregate block.

They can be used in conjunction with each other, either as single-ski i buttressed walls (usually 4 in. wide , double skin cavity walls, 8 in, soli l wall or as a facing to a block or in-sit 1 backing.
Plain blocks need no introduction.

They produce a solid, economica, rather unimaginative wall and have been used extensively for agricultural

[continued on page 436



In J. R. Freeman & Son Ltd's new single-storey cigar factory at Cardiff extending over 10,000 sq. yds., an 8" deep slab spanning 15 ft. had to carry a load of 224 lb/sq. ft. whilst allowing for 2-ton point loads for fork lift trucks. It was further necessary to suspend the slab only three feet above ground level. The Omnia Floor was chosen because it met all these requirements economically by giving continuity over supports and dispensing with the need for shuttering. Omnia Floors play an important part in the rational design and construction of many other factories, offices, flats, houses and special purpose buildings of all kinds throughout the country.



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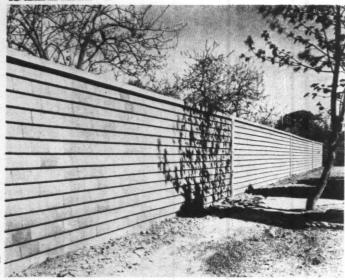
Darlaston. Bradleys (Concrete) Ltd. Bedford, C. A. E. C. Howard Ltd. Abingdon. Cowley Concrete Co. Ltd. London. Atlas Stone Co. Ltd. London. F. Bradford & Co. Ltd. Southampton. The Blokcrete Co. Ltd. St. Austell. English Clays Lovering Pochin & Co.

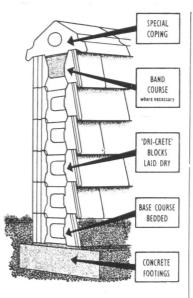
Full details about Omnia will gladly be provided by one of the Licencees or by

OMNIA CONSTRUCTIONS LIMITED, 25-35 City Road, London E.C.1. Telephone: MONarch 2272

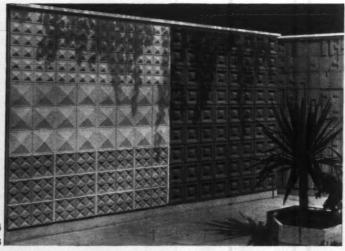
Nottingham. T. C. Campbell Ltd.

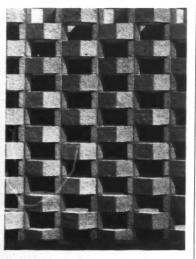
# SHILL

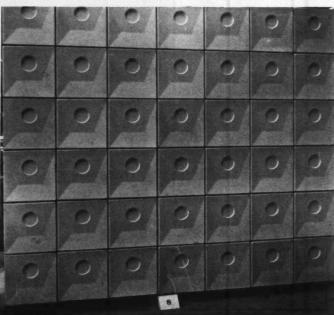


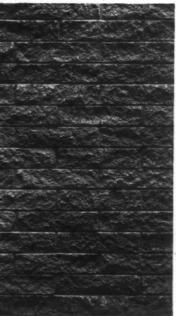


2, 3, 'Dri-Crete' mortarless concrete block. 4, profiled block walling by Flynn Brothers. 5, pierced wall made from U-shaped units, designed by Bryan Westwood and made by Mono Concrete Co. Ltd. 6, profiled blocks cast against thermoplastic forms by Modular Concrete Co. Ltd. 7, exposed aggregate block by Atlas Stone Co. Ltd.









### continued from page 434]

purposes. Their construction is covered by BS 2028 and there is a considerable range of sizes, although the most common is 17\hat{\frac{1}{2}}\ in. by 8\hat{\frac{1}{2}}\ in. by 4 in. An interesting devel, pment of the plain block is the 'I ricrete' mortarless concrete block by British Art Tile Company Ltd. of Cambridge, 2. The blocks are available in a range of sizes from 4\hat{\frac{1}{2}}\ in. to 10 in. wide and can be made in a variety of materials and colours. It is claimed that erection speed is four to ten times faster than that of brickwork and the cost of material is less.

Profiled and pierced blocks have been developed to a much greater extent in America than in this country. One British block manufacturer has stated that in England bricks are too cheap. It must be remembered however that bright sunlight gives a sparkle and interest to the most poorly designed block. In a dull climate, greater reliance must be placed on shape, colour and texture and profiles tend generally to be coarser. A number of firms have experimented in recent years with these types of block and some of their products are on permanent exhibition at the Cement and Concrete Associations Research and Development Division at Wexham Springs. 4-6 show some of these. 7 shows Shadowal Blocks by the Atlas Stone Co. Ltd. These are made in any of the usual aggregates—ballast, clinker, foamed slag, aglite, etc., and can be combined to give a very wide variety of patterns. It is claimed that the cost of the profiled block is only fractionally higher than that of plain blocks.

There is room on the market for more standard blocks, which can be combined with each other, particularly for screen walls and also possibly for paving as well. One can understand the reluctance of manufacturers to embark on a project which may leave them with a stock of unused concrete units in their yard; on the other hand there is little doubt that if the units were available, they would be used for countless small jobs, where at present the high cost of a 'special' mould makes the architect think again—and not in terms of concrete blocks.

### Exposed Aggregate Blocks

Considerable experiment has taken place since the war in the development of exposed aggregate panels for use as cladding to light steel buildings. A wide range of colour is available using natural stone and surface texture can be varied by the size of the aggregate and by treatment of the block before or after it has been removed from the mould. Smooth surfaces are obtained by

Smooth surfaces are obtained by grinding or casting against plastic sheeting; fine textures by acid etching, felt floating or scraping some hours after casting. Medium to coarse textures are obtained by spraying with water before hardening has taken place or brushing after the concrete has begun to harden. For coarse textures, the larger aggregate is either set in sand in the bottom of the mould and the concrete cast on top or the blocks are cast face up and the aggregate bedded in a layer of mortar by rolling or tamping. Subsequent tooling of the surface can also be carried out. All these techniques can be applied equally well to the manufacture of exposed aggregate blocks, and a growing number of manufacturers is producing these as a standard article. 7 shows a pressed concrete slab by the Atlas Stone Co.

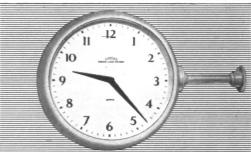
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# A certain style

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# SHILL



### continued from page 436]

split on a guillotine to produce an exposed aggregate and profiled face. A similar technique is employed in Messrs. Selleck, Nicholls 'Reformite.' 8 shows a split block with a ribbed face.

A departure from the usual run of screen walling is shown in 9. The possibilities of this type of wall are very great, although the cost of manufacture and handling on a small contract might be rather high.

### Timber

New designs and techniques in this exceptionally adaptable material are forever making their appearance and whether they serve fashion or function their arrival is always of interest.

10 and 11 are prototypes from the Timber Development Association, which have not yet been tried out in the field. 10 reflects the current fashion for heavy-section horizontal boarding which has been used so successfully for screen walls to filling stations and schools. It is a welcome design, for to date plywood as a fencing material has generally been used for surrounding builders' compounds when it has not been doing duty as shuttering.

The tendency to manufact rebuilding components in the factory rather than build them on site is reflected in the prefabricated fencing panels and kits now on the mark t. The earliest of these was the intravoven panel. There are now for variations available:

1. the simple interlaced panel with

1. the simple interlaced panel with one vertical stiffener on both sides, which cost approximately 33s. crossoted 6 ft. by 6 ft. and about twize as much in Western red cedar.

2. a variation which may cost up to 20 per cent more has slats overlapping ½ in, and two stiffeners at each side to hold the slats in position.

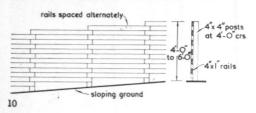
 a proprietary make 'Superlap' notches the slats where they lap each other, thereby considerably stiffening the panel.

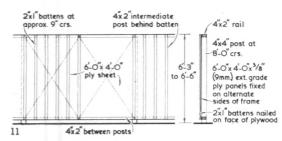
4. 'Larch-lap' by Joseph Corbett & Son, Stourport-on-Severn, which is considerably stronger and has a much longer life at approximately 39s. 6d.

longer life at approximately 39s. 6d. City Timber Ltd. supply kits for closeboarded, post and rail, and pale fences. All timbers are cut to size and prepared and are delivered in packages ready for erection. Six-foothigh Close Boarded kits range from 92s. to 125s. per 10 ft. panel, dependent upon timber and finish; six-foot paling, 93s. to 111s. per panel; post and rail 5 ft. high 62s. to 89s. per 8-ft. panel.

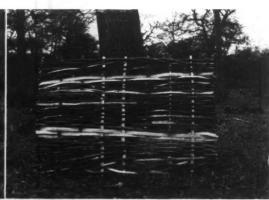
In rural areas traditional materials may provide the only really satisfactory answer. The Rural Industries Bureau is most helpful in all these matters. Wattle hurdle fencing is shown in 12 and 13. Interesting reed screen fencing from Glamorgan and Norfolk, which is wind and sheep proof and well suited for domestic and agricultural use, is shown in 14 and 15.

8, concrete block with ribbed face. 9, screen wall of precast concrete posts designed by Bryan Westwood and manufactured by Mono Concrete Co. Ltd. 10, TDA prototype timber fencing using horizontal boarding. 11, TDA prototype fence incorporating plywood sheets. 12, 13, wattle fencing. 14, reed screen fencing from Glamorgan and, 15, from Norfolk.

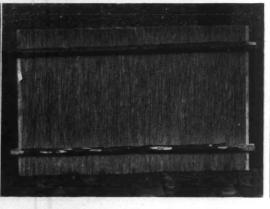






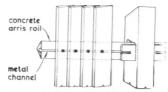






# Maintenance and Repairs

The cost of keeping fences in good repair can be very high. This consideration often determines the initial selection of a fence and also those unfortunate decisions to replace old but pleasant fences with new ones, which are ugly but maintenance free. Domestic timber fences, usually constructed from comparatively light sections, are liable to rot where the posts enter the ground and also at the joints. Concrete spurs have been used for many years to strengthen or replace defective posts; indeed cases have arisen where timber posts have been bolted directly to the spurs in the first instance. Reinforced concrete has been used for the framing of CB and pale fences in order to preserve the beauty of the timber on face, but avoid the rot in the sup-

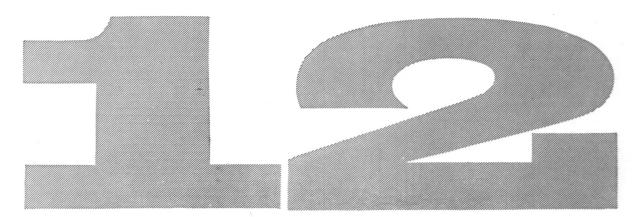


16, 'Fixafence' concrete arris rail with me'd channel for repairing wood fence.

porting members at the rear. One firm makes a concrete arris ral, into which is cast a timber insert, o which the boards are fixed. Another firm casts in a metal channel, 13, and the boards are fixed there o with ordinary wood screws. There is

[continued on page 4-10

# THE LOGICAL USE OF COLOUR IN BUILDING



# The eye-contrast and the

# enhancement of contrast

The importance of ensuring the right degree of contrast in the several parts of a decorative scheme cannot be over estimated. That such contrasts should lie between certain limits, and that contrasts can nowadays be partly calculated, is well known.

It is not the purpose of this note to consider contrast in general, but the use of colour to produce an enhancement of colour contrast by placing colours near to each other but not adjacent to each other. In this way certain complementary colours can be used to make certain objects or architectural features more or less prominent. Simply, the basic hues, blue-yellow, red-green, when placed near but not adjacent to each other, enhance or increase the chroma of each colour. If the pair are originally of high chroma, then the enhancement effect can almost reach the pain level. If one is of high luminance and the other low, then the high luminance colour appears lighter and the low luminance colour darker than if they were viewed separately. The effect of this contrast enhancement can be controlled by the degree of separation of the colours and framing one with another different colour. This serves to emphasise the chroma of the colour and to prevent the unpleasant adjacent complementary colour associations. If the frame of a door (already painted a high chroma colour) is painted with a high value colour (say cream and white), the decoration of the door is enhanced.

By suitable choice of the position or area of the red-green, blue-yellow parameter colours, the enhancement of colour can be made a decorative feature.

This is one of a series by Goodlass Wall and Co. Ltd. paint specialists since 1840 and manufacturers of the famous Combinol and Valspar paints — who will be pleased to give free advice on colour schemes and painting specifications. Goodlass Wall and Co. Limited, Corn Exchange, Liverpool 2 and 179/185 Gt. Portland Street, London, W.1

# SHILL

continued from page 438]

a bracket available which can be screwed to the post to take the arris rail when the joint has gone. A similar bracket in mild steel by Metal Mouldings Ltd. can be adapted for the repair of rails damaged along their length by cutting off the fixing lugs and using it as a sleeve.

### Metal Fencing

A survey of the metal fencing field reveals that most types have been in the running for many years. Hori-zontal bars have fenced drive and paddock for generations and will still do so from 20s. a yard (3 ft. 6 in. high ex works). Vertical bars, the successors of eighteenth-century ursuccessors of eighteenth-century ur-ban railings, can still surround town houses from about 38s. a yard. Corrugated steel pale fencing 6 ft. high costs from 76s. and corrugated sheet iron from 58s. a yard.

The most far reaching development however has probably taken place with regard to chain link. Whatever its aesthetic shortcomings, it pro-vides a fence which is cheap and easy to erect, fairly difficult to climb and forms an efficient barrier against balls, children and smaller animals. Maintenance costs are low and re-pairs are easily effected. With the foregoing points in its favour its use in ever increasing quantities seems

By making the fence from coloured plastic covered wire, its life has been lengthened considerably and with careful colour selection, it could blend with its surroundings and become almost invisible. It may suggest the old army adage that if you can't lose it, paint it, but it is a fact that if the fence is invisible many objections to its being there will also disappear. By coating mild steel standards with coloured plastic, these could also be lost in the back-ground. Experiments have been made to vary the colour of concrete supporting posts, although up to now these have not been an unqualified success. A further use of plastic lies in the coating of small assemblies by dipping, spraying or sleeving when the construction makes this possible. These techniques improve the weathering qualities of the fence and by the introduction of permanent colour may make it more attractive or suitable for its purpose.

## Gates

It is significant that in contrast of walls and fences, a review of gates reveals little that is new. This may be due to the satisfactory design of the traditional types or to the lack of scope for innovation in an element where the user requirements are

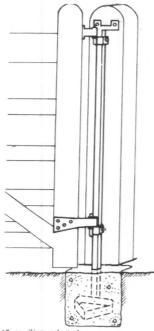
simple, yet inflexible.

In agriculture, the timber five-bar gate is still in general use. Its metal counterpart, whether in angle iron or tube, riveted or welded, follows the same basic design. Even when the gate onening has to be increased. gate opening has to be increased, from the desirable maximum of 10 ft. for a timber gate to 14 ft., to allow agricultural machinery to pass, allow agricultural machinery to pass, this is accomplished by thickening the m.s. frame rather than by altering the form. An inexpensive and efficient field gate by MAC Bristol is hung on eyebolts fitted into a slotted hanging stile, which allows a vertical adjustment should a periodic build up of the ground level take place.

17 shows an auxiliary gate post by

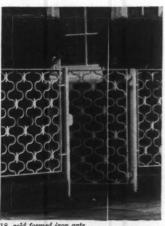
ground level take place.

17 shows an auxiliary gate post by Woburn Engineering Ltd. This also incorporates a vertical adjustment and is primarily intended for the repair of gate posts which have begun to rot around the lower hinges. It can also be fitted to a new post.



17, auxiliary gate post

A wide range of domestic gates is available both in wood and metal. Timber gates are usually variations of traditional palisade designs or framed and boarded types. Both are of relatively light section timbers and must be maintained regularly to give long service. Failure invariably occurs at the metal fixings and at morticed joints, and there would appear to be room for experiment with lightweight gates, assembled with waterproof glue, in which these sources of corrosion and rot are eliminated. Lightweight metal gates of thin cold bent rolled sections, electrically welded together, are being produced in their thousands and are roundly condemned for their poor design and weak imitation of tradi-tional wrought ironwork. There are, however, some gates which have been designed within the limits of this material and technique which, while not of the highest quality, at least offer an inexpensive and aesthetically not unpleasing solution to the prob-lem of a light 'open' domestic gate. An interesting gate has been An interesting gate has been pioneered by the Rural Industries Bureau using a new technique of cold formed sections. Bars are bent on edge, having their width as their face side. These are made in six



18, cold formed iron gate.

standard shapes which can be combined to produce a great variety of

### Conclusion

Reviewing the position of fencing and gates as a whole, it is apparent that, more and more, cost rather than quality is the criterion. This is of course true throughout the building industry, but it is particularly unfortunate with regard to these elements, which are always the first

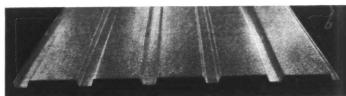
to suffer when economies have to be made. While there is no ready-nade solution, a twofold approach to the problem is possible—atten pts could be made to streamline roduction techniques and at least leep prices stable against a background of rising costs; and greater are could be taken in selection, bea ing in mind that a simple produc often the best and that which cheap is not necessarily of por design.

### INDUSTRY THE

### Aluminium cladding

James Booth Aluminium Limited announce that they are extending their activities to the manufacture their activities to the manufacture of building products. They have introduced 'Boxrib' vertical cladding, 1, designed specifically for wall cladding, It is an 8 in. pitch troughed aluminium sheet with 1 in. deep ribs. It is available in one gauge—21 s.w.g. (0.032 in.)—and one finish—stucco embossed. Standard lengths are from 6 ft. to 24 ft. in 6 in. increments. Standard width is 415 overall, providing a cover of 40 in.

large cheese head screws on the spine which engage in keyhole slots and are then tightened. Diffusers are and are then tightened. Diffusers are attached by a simple system of hooked lips. They may be taken down for cleaning or hinged down from either side of the fittings for re-lamping. Control gear may be either "Ouigksteatt" or "Switchsteatt". either 'Quickstart' or 'Switchstart.' Typical prices are as follows (these all relate to 'Switchstart;' 'Quickstart' circuits cost slightly more): for the batten fitting type (two tubes) 4 ft. is £5 16s., 5 ft. is £8, 8 ft. is £11 12s.; for the angle reflector type



1, 'Boxrib' vertical cladding.

allowing for lap. The aluminium alloy ALM, corresponding to BS 1470-NS3. An informative catalogue has been produced to A4 size with an

SfB number.

James Booth Aluminium Limited, Kitts Green, Birmingham, 33.

### Fluorescent lighting fittings

A new range of fluorescent lighting fittings, known as the Durham range, appeared on the market for the first time in September. The manufacturers, Ekco-Ensign Electric Limited, describe the new range as filling the gap between their de-luxe Essex range and the Super Slim packaged fittings. A feature of the packaged fittings. A feature of the new fittings is a spring mounted lampholder, which is bi-pin and completely encloses the lamp cap. It is attached to the fitting by flat strip springs. All fittings are based on standard single or twin-lamp spines, complete with built in control gear and lampholders, ready wired.

and lampholders, ready wired.

Every fitting in the range is available in 4 ft., 5 ft., and 8 ft. lengths. Spines have only two suspension holes. The same channel sections are used for all fittings, whether single or twin-lamp. All spines have flat, vertical ends. Starter switches are mounted in the sides of the spines. The designers say that the choice of this position for starter switch sockets is dictated by popular demand. Cover plates, repopular demand. Cover plates, reflectors and diffuser suspension plates are interchangeable. They may be easily attached by means of two

(two tube) 4 ft. is £7, 5 ft. is £9 6s., 8 ft. is £14, and for the totally enclosed diffuser fitting (two tube) the 4 ft. is £9 14s., 5 ft. is £12 8s. and



2, Ekco Durham series 181 fluorescent fitting.

8 ft. is £17 17s. (purchase tax on the diffuser is not included.)

Ekco-Ensign Electric Limited, 45,

Essex Street, Strand, London, W.C.2.

### Up and over doors: Corrections and an omission.

In the first Skill article on Up and Over Doors (August, 1961) on page 142 we stated that the Bolton Glydover Door was made in steel up to 30 ft. by 15 ft., that this door was made in timber as well as in stel and that the price for a steel door 8 ft. by 7 ft. is £40 12s. 0d. It see ns that our contributor misunderstood some information given to him o er the telephone. The Glydover Door is not available in steel 'up to 30 ft. by 15 ft.;' there is no timber version of

[continued on page 42

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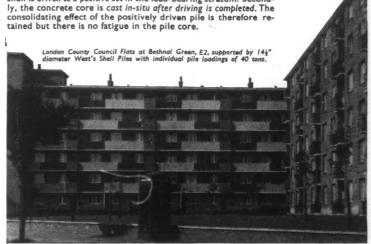
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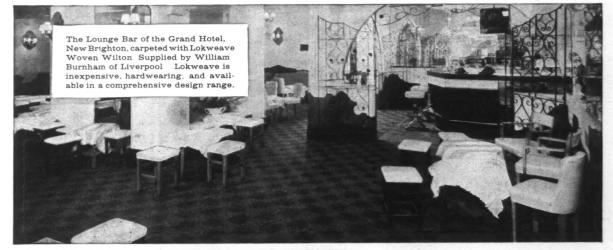
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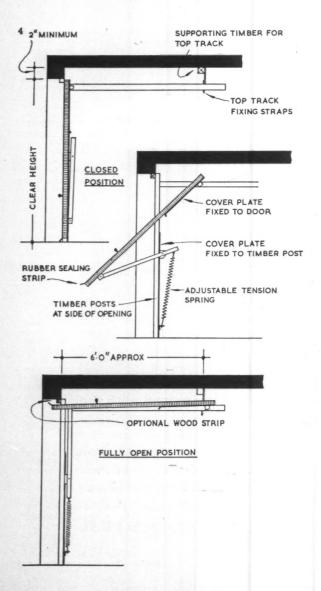
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3, Haskins' Rol-over-dor; 4, sections showing method of opening.



continued from page 440]

this door; and the price for the 8 ft. by 7 ft. steel version is £28 delivered only.

In the second article of the series (September, 1961) illustrations number 13 (page 212) described as 'Hillaldam 'Flyover Two'' and number 15 (page 214) described as the 'Portaldor' have been transposed. We much regret these mistakes.

It has also been pointed out that the Rol-over-dor of Messrs. Haskins has been missed out altogether. Review articles of this kind can seldom be fully comprehensive, but we consider that the omission of so well established a manufacturer calls for some amend. We, therefore, give below details of this which will enable readers to compare it with the others.

The Rol-over-dor is a galvanized steel door which operates in the manner shown in the diagram. It is made in three sizes. Prices are as follows:

follows:

7 ft. by 6 ft. 6 in. £18 15s. 0d. 7 ft. by 7 ft. £19 5s. 0d. 8 ft. by 7 ft. £21 0s. 0d.

All prices include delivery. The manufacturer's address is *Haskins*, Gnome House, Blackhorse Lane, Walthamstow, London, E.17.

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Garage at Longbridge, Birmingham, Architects: Harry W. Weedon and Partners. General contractor: British Lift Slab Ltd. Sub-contractors: Cladding: Roofing Engineers Ltd. Mineralite: Kendalls Flooring Ltd. Lifts: Evans Lifts Ltd. Colourceld: British Aluminium Co. Barrier railing: Shelton Iron & Steel Ltd.

Garage at Aldersgate. Architects: Oscar Garry and Partners. General contractors: The Fram Group. Sub-contractors: Facing slabs and stonework: Saunders (Ipswich) Ltd. Windows: Standard Maclean Ltd. Basement ventilation: Lorne Stewart (Heating) Ltd. Basement sprinklers: Mather & Platt Ltd. Lifts: The Express Lift Co. Electrical: Troughton & Young Ltd. Roof decking: Frazzi Ltd. Fire shutters: Dennison, Kett & Co. Ironwork: Harold W. Cooper Ltd. Petroleum spirit tanks: Gilbarco Ltd.

Garage at Southwark Bridge. Architects:
C. Edmund Wilford and Son. General contractor: Myton Ltd. Sub-contractors: Entrance gates: Acme Metal Works (1921) Ltd. Ironmongery: G. & S. Allgood. Windows: Aygee Ltd. Steel deck roof: William Briggs & Sons. Sanitary fittings: John Boldings & Son Ltd. Joinery: Builders Supply Co. (Hayes) Ltd. Vertical metal plastic covered fins: W. G. Cannon & Sons Ltd. Metal work: Clark Hunt & Co., H. & C. Davis & Co. Floor and wall tiles: Durastic Ltd. Painting: Decorative Specialists Ltd. Painting: Decorative Specialists (Kensington) Ltd. Fire extinguishers: Extinguere Co. Automatic control gear: Expert Industrial Controls Ltd. Lightning conductors: J. W. Gray & Sons Ltd. Electric wiring: Hartley Electromotives Ltd. Plastering: J. H. Jenner (Plasterers) Ltd. Coping stones: Kendell's Stone & Paving Co. Structural steekwork: Lindsay Paddington Ironworks (1948) Ltd. Bricks: Richard Parton (Builders Merchants) Ltd. Car conveyors and sheet steel floors: S. E. Opperman Ltd. Car lifts: Porn & Dunwoody (Lifts) Ltd. Lift gates: Potter Rix Ltd. Electric signs: Phoenix Electrical Co. (London) Ltd. Piling to foundations: West Piling & Construction Co. Metal work: Zenith Light Engineering Products Ltd.

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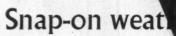
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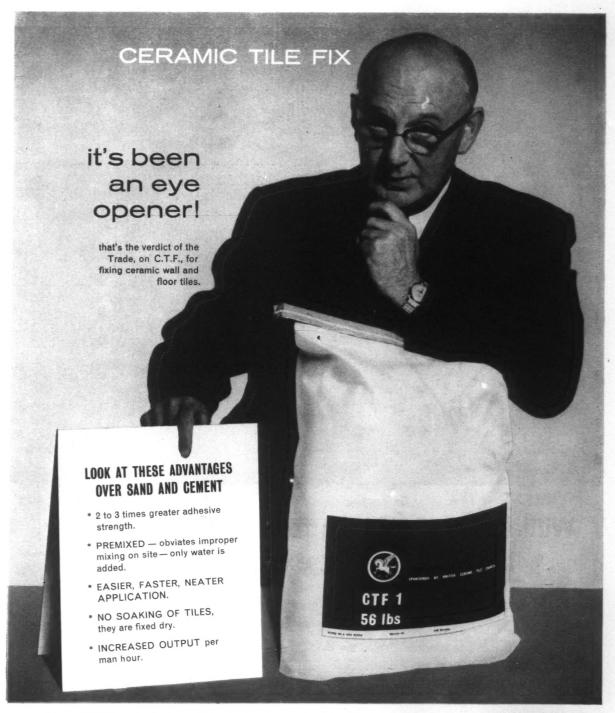
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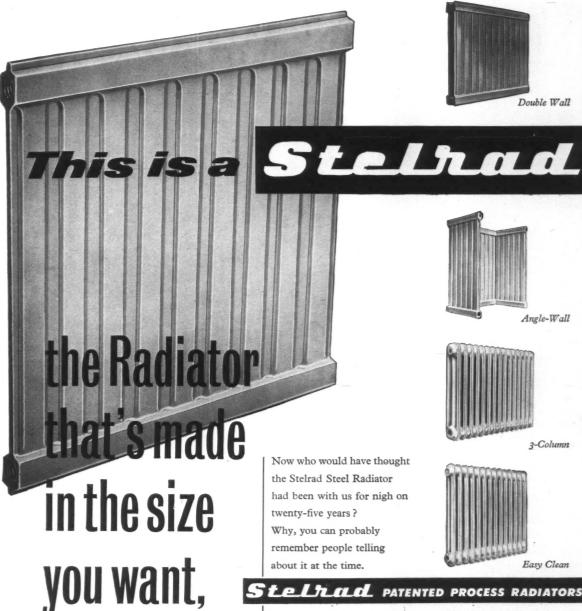
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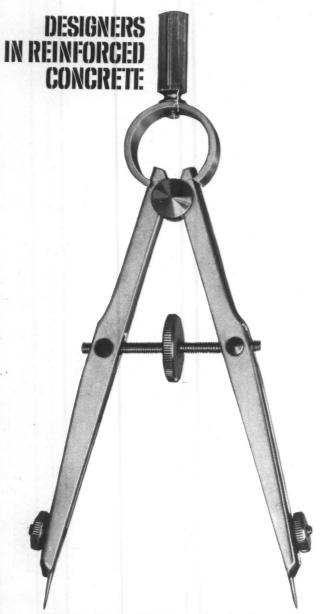


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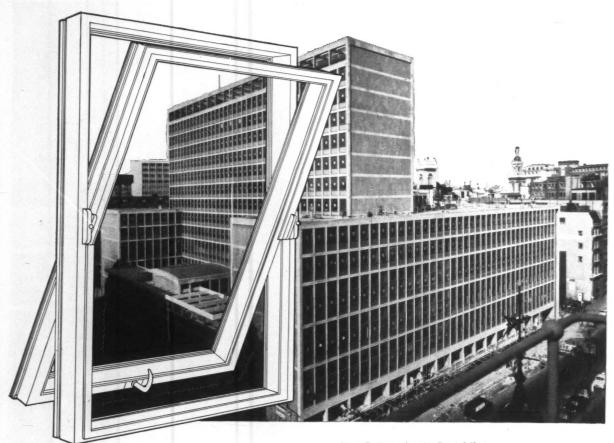
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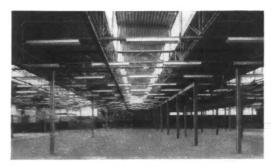
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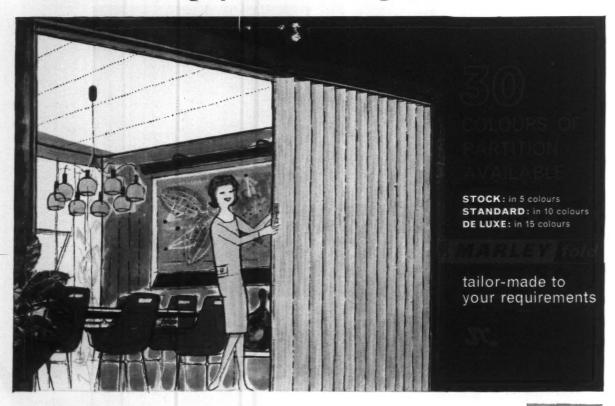


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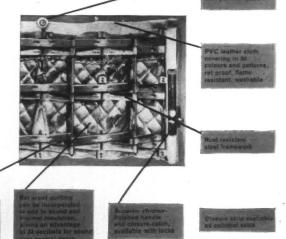
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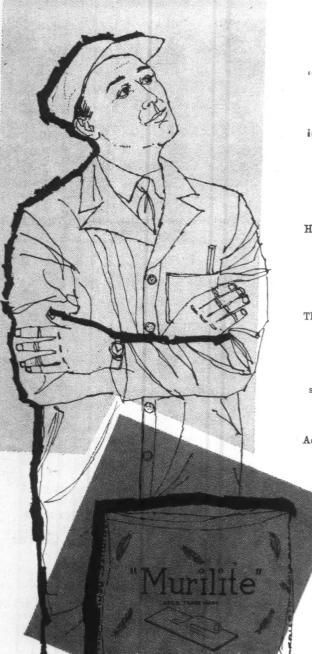
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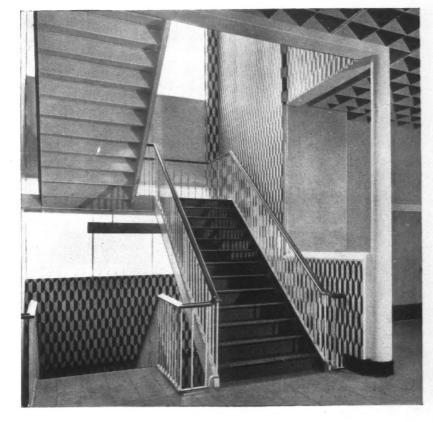
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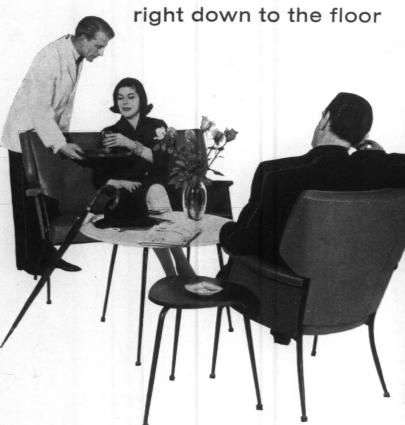
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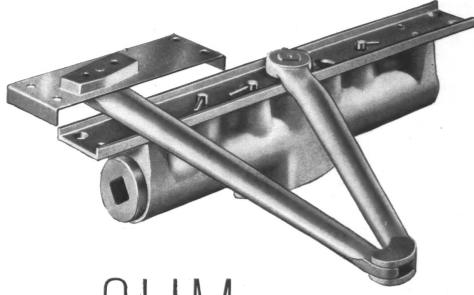
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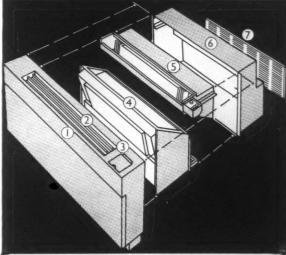
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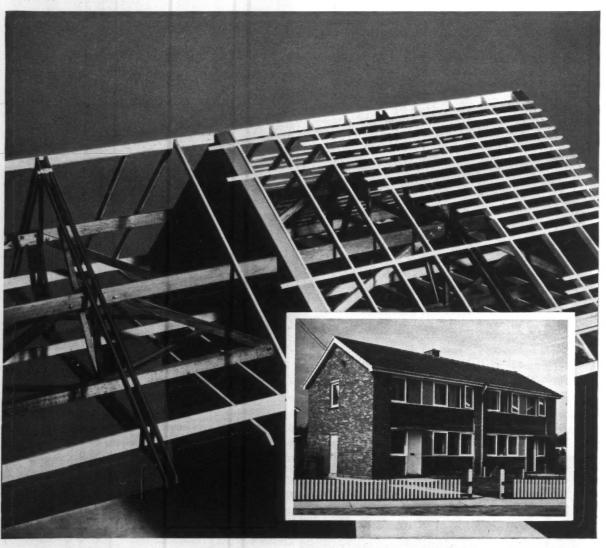
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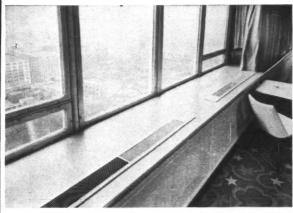
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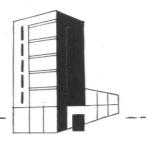
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"Methought a voice within the tavern cried
"When all the temple is prepared within
Why nods the drowsy worshipper outside?"

"Omar Khayyam: Fitzgerald.

By A. F. B. Nall, A.M.I.San.E., A.M.Inst.W.

In hotels and restaurants generally as well as in those modern temples of health within—the bathrooms and washrooms, five-star amenities are impossible on a one-star budget. Faultless sanitary equipment, therefore, serves the well-being of hotelier and restaurateur equally with that of their patrons. Constant use by a continuous stream of visitors, oft inconsiderate or heavy-handed, demands a very high standard of durability, scrupulous hygiene and a most attractive appearance. Suitably impressed, today's casual hotel visitor may be tomorrow's resident; inadequate attention to comfort and cleanliness in the restaurant erases the memory of good cuisine.

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every decorative scheme.

Modern Hotel and Restaurant plans should embody the principle that comfort and health are indivisible; the protection of health demands sanitary appliances of the highest order. No longer is "h. and c. in every room" something to boast about. The aim should be a private bathroom to every bedroom, containing ideally, a bath, washbasin, w.c. suite and bidet. Shower cubicles with Glazed Fireclay receivers however, save space and conserve capital. In public washrooms the durability of Fireclay-washbasins is particularly desirable, while large sized basins minimise external splashing. The clean-lined hygienic qualities of Glazed Fireclay are particularly suitable for urinal ranges where integral cisterns and buried pipework obviate metal polish and rag—and the risk of eyesores; Fireclay corbel-type w.c. pans facilitate cleaning even further.

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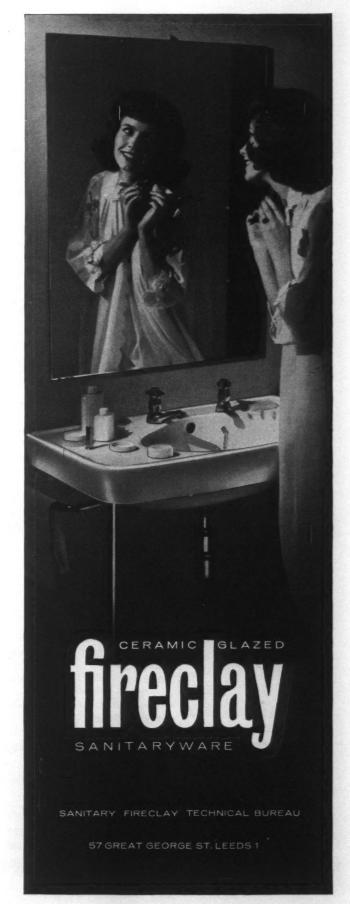
invite and encourage personal cleanliness.

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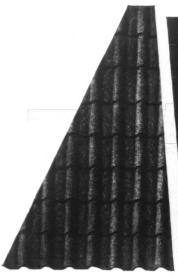
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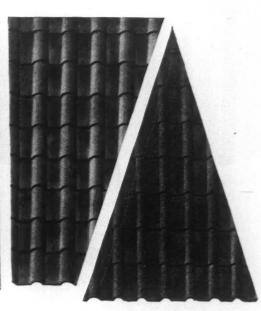
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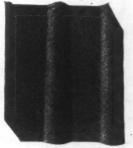




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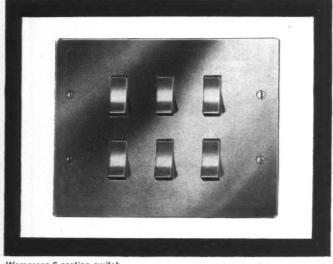


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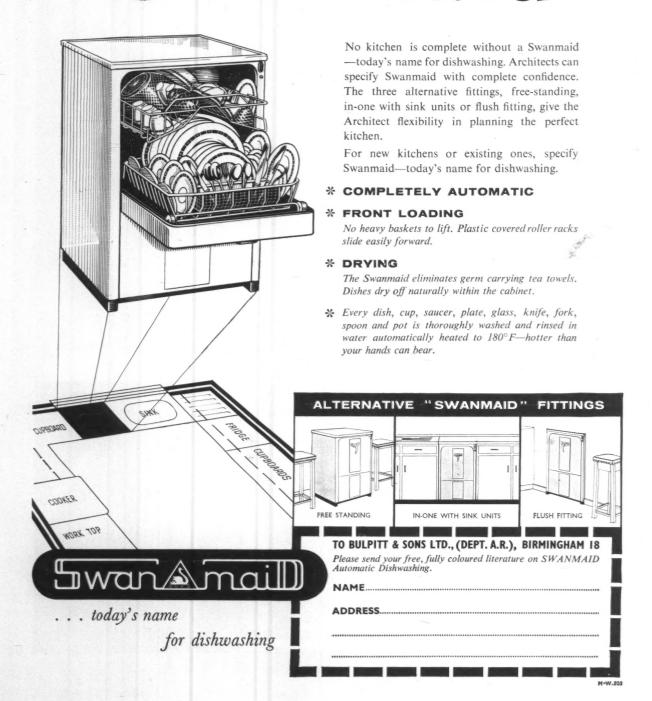


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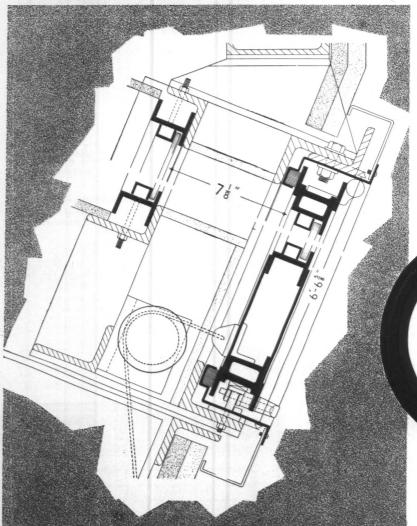
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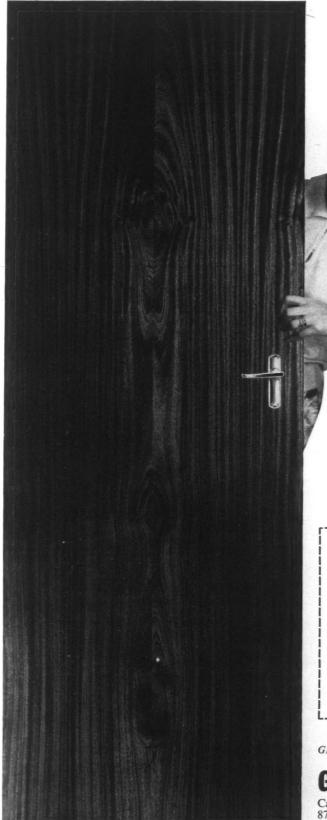
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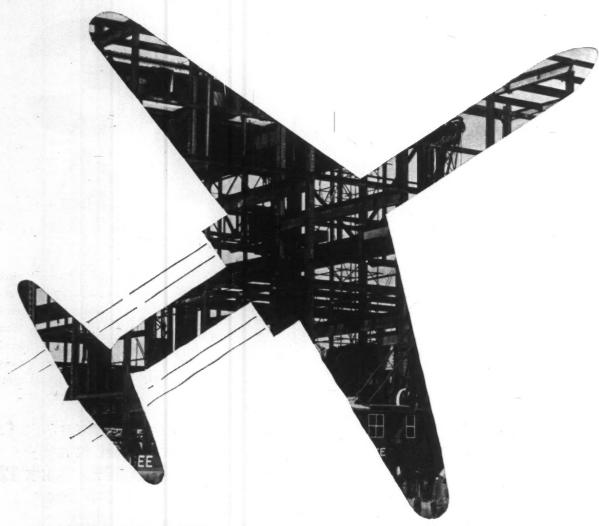
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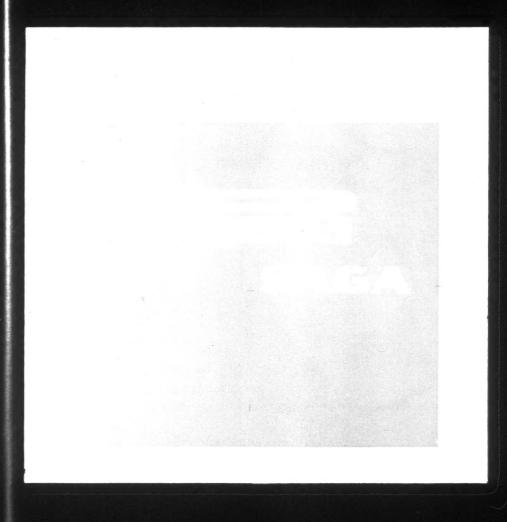
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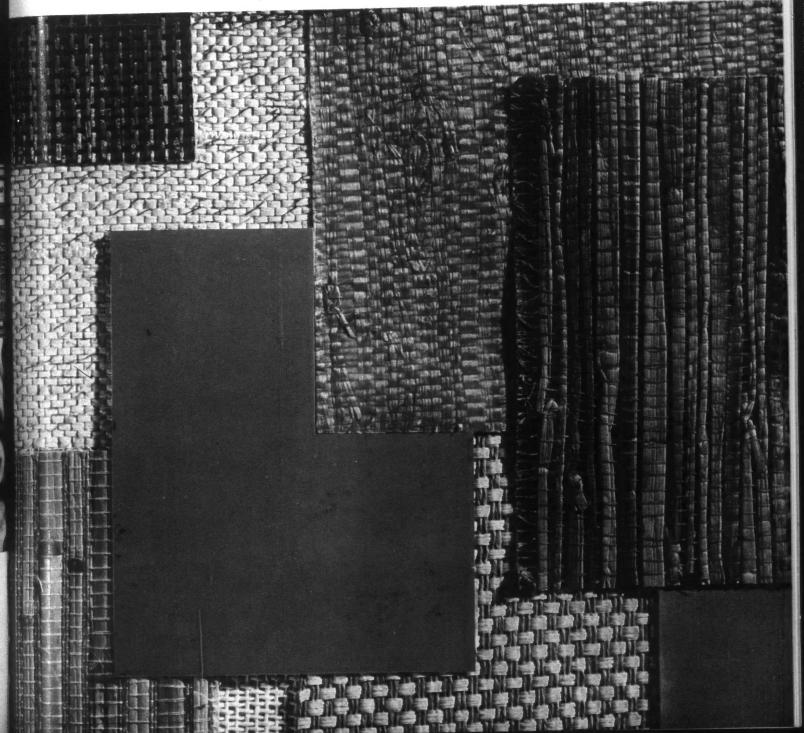


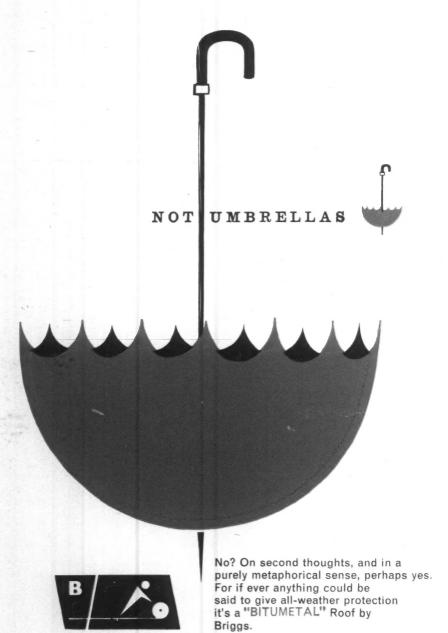
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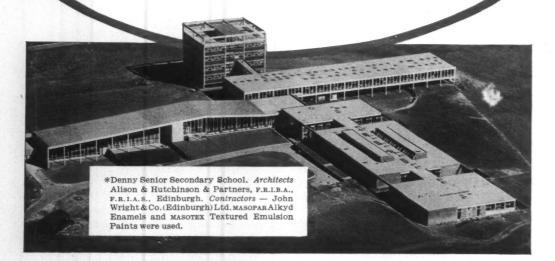
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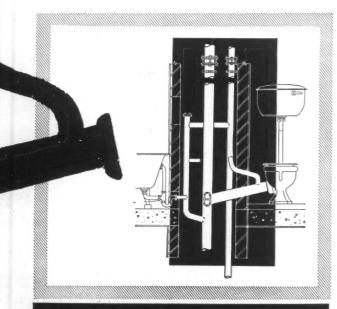
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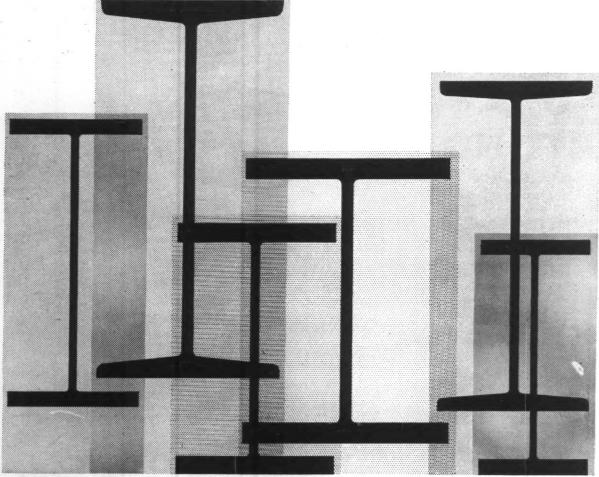
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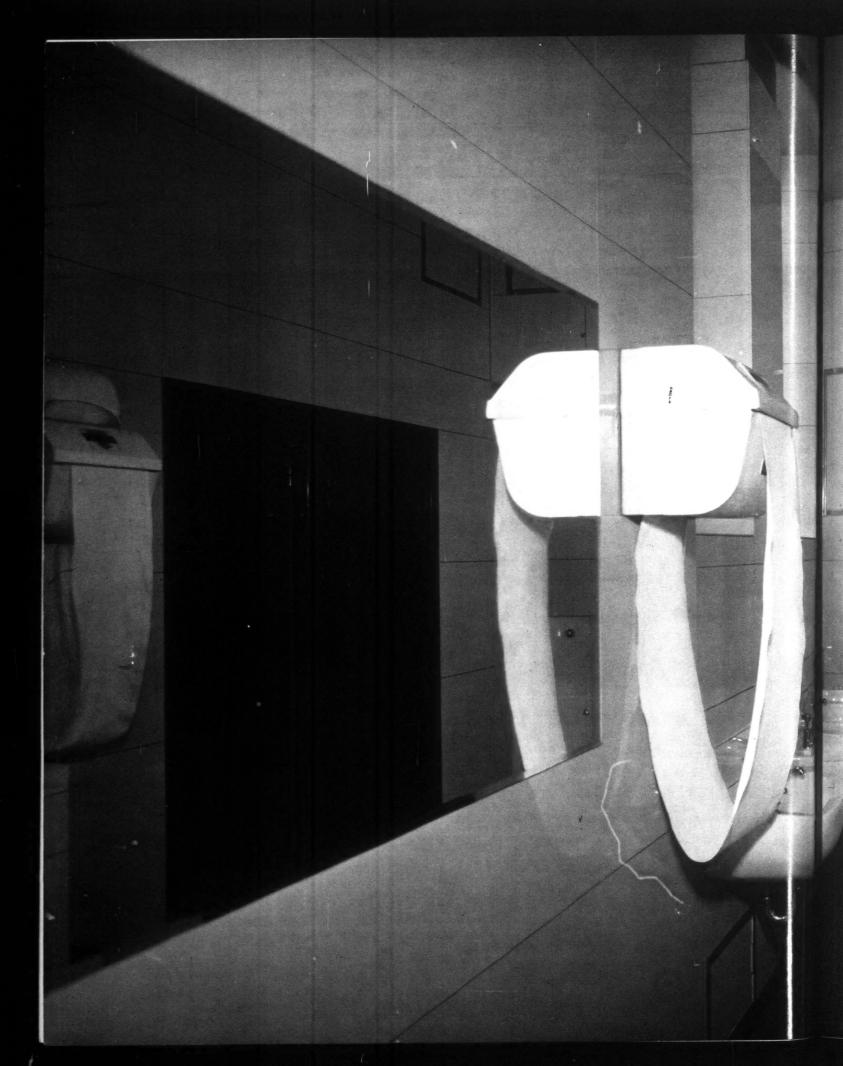


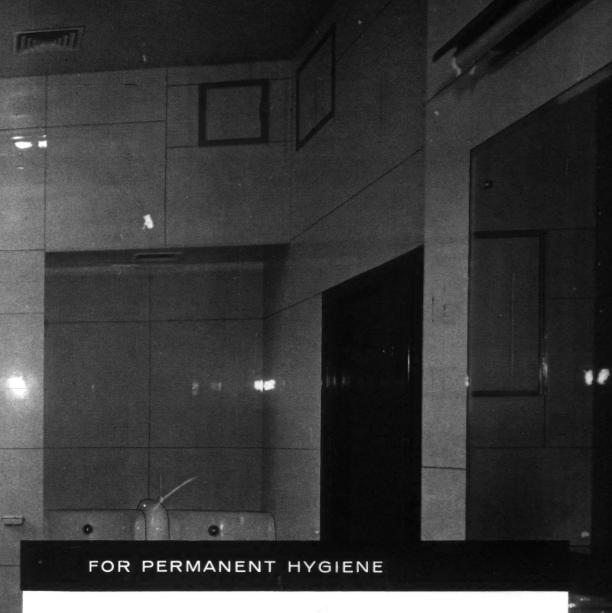
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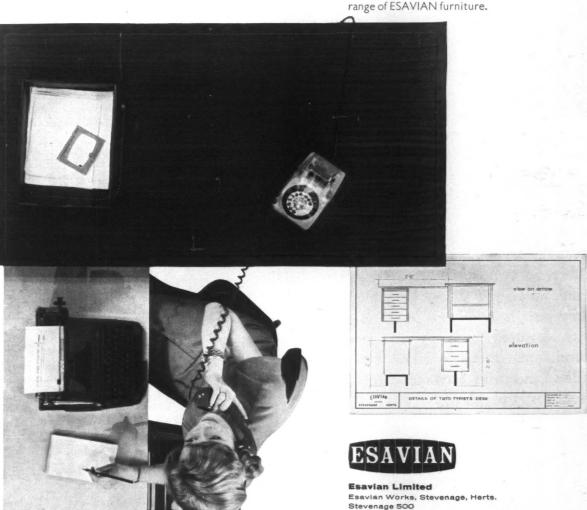
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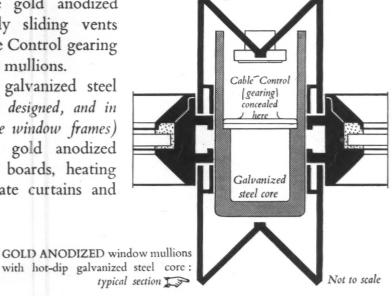
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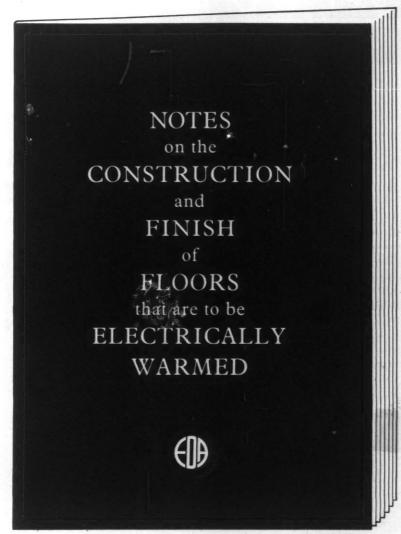
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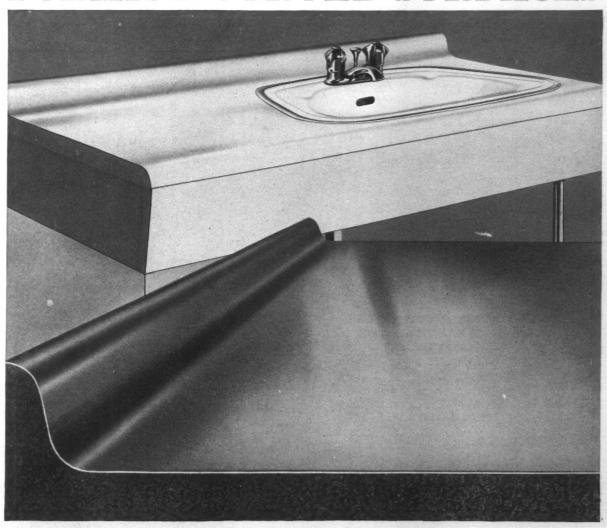
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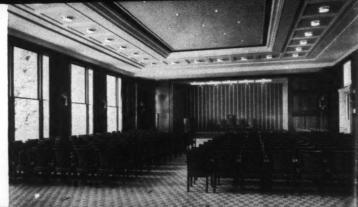
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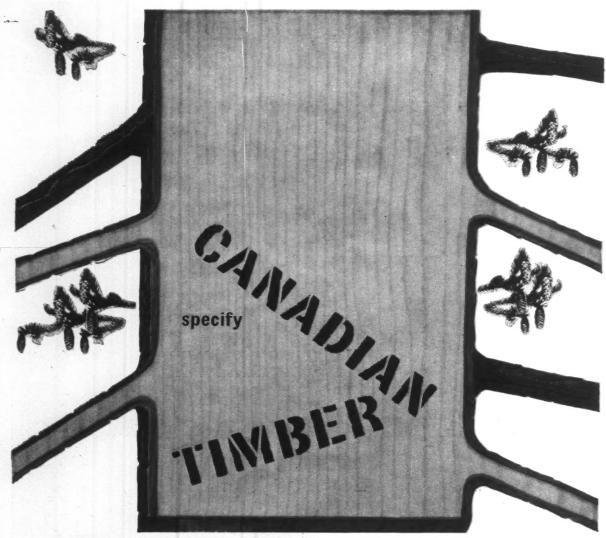
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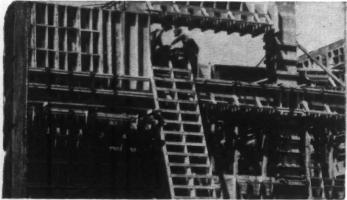
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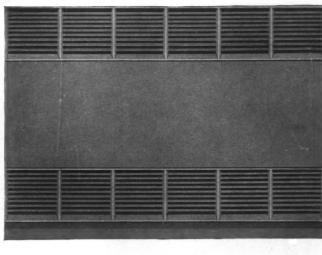
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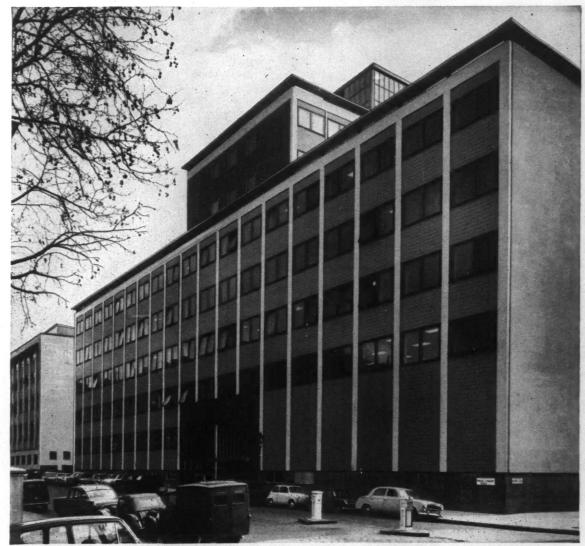
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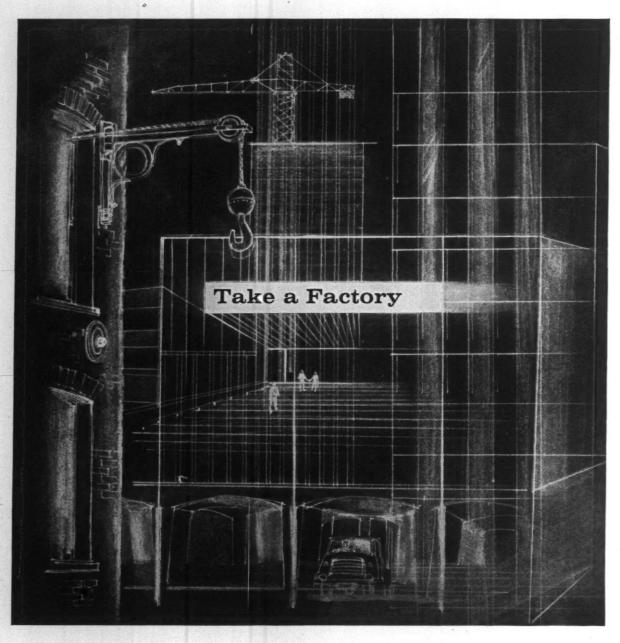
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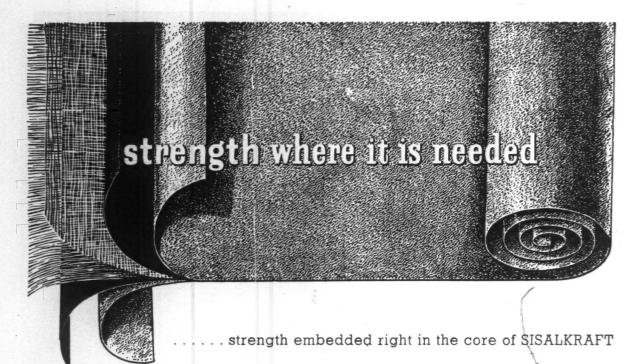


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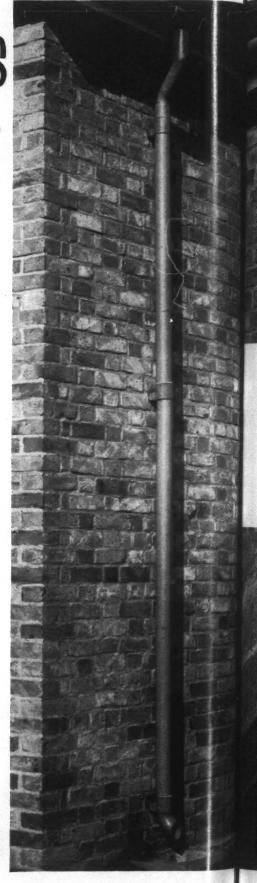
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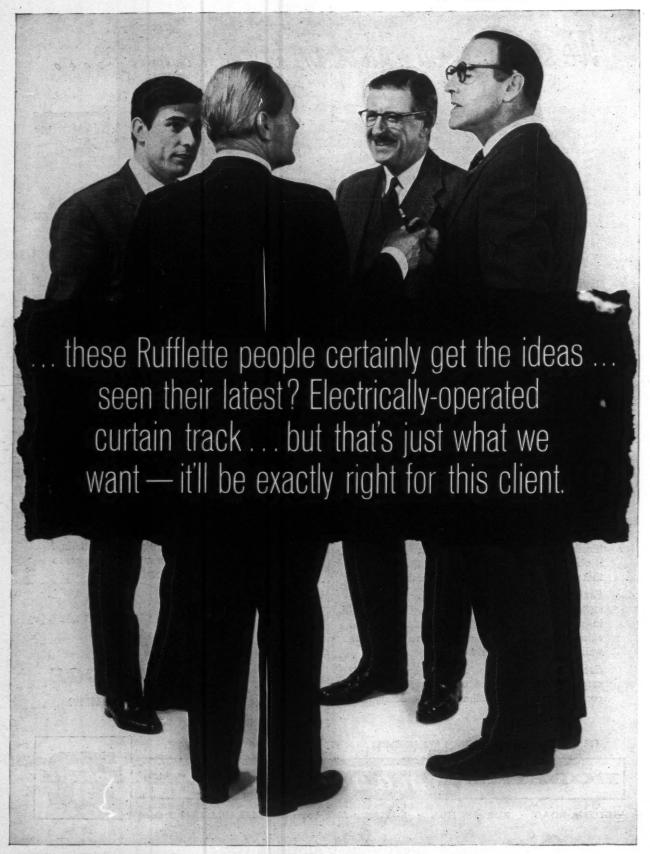
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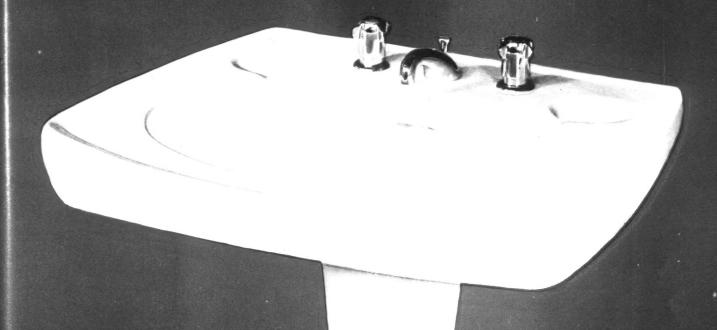


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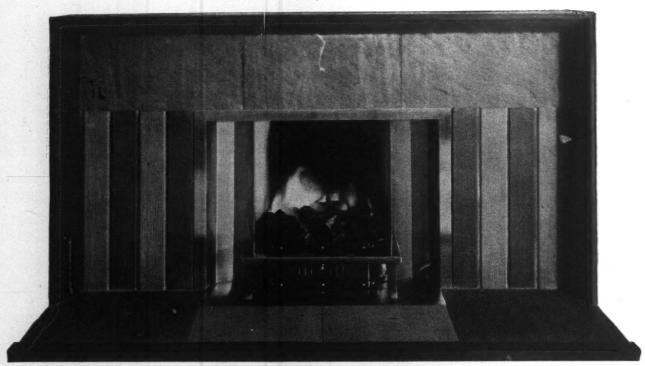
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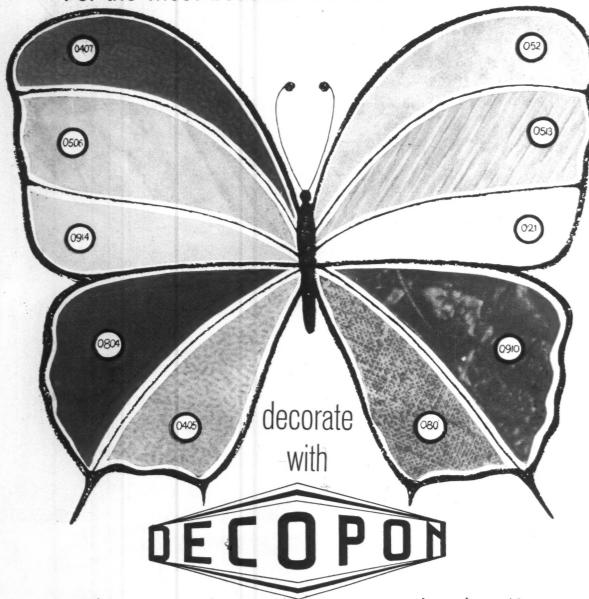
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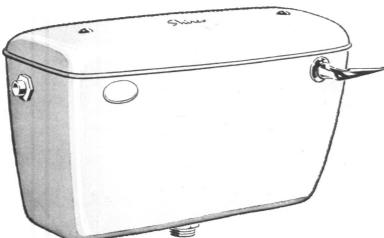


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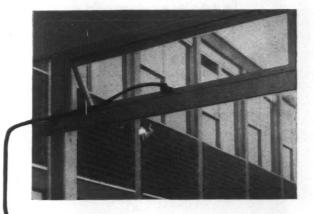
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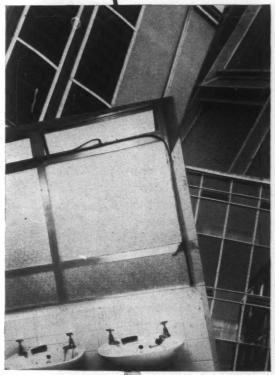
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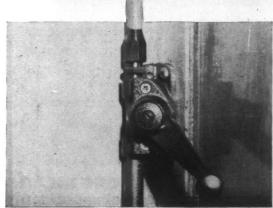
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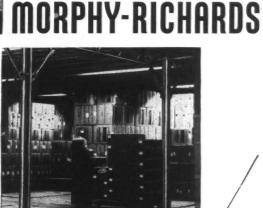
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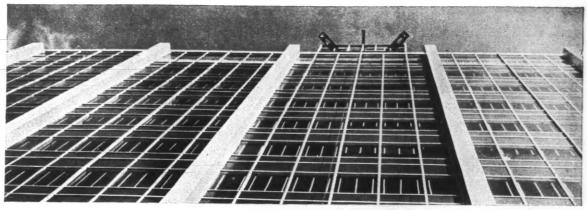
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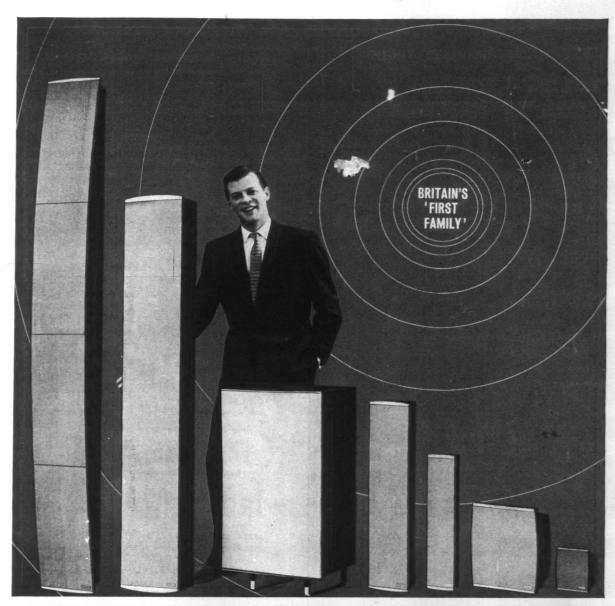
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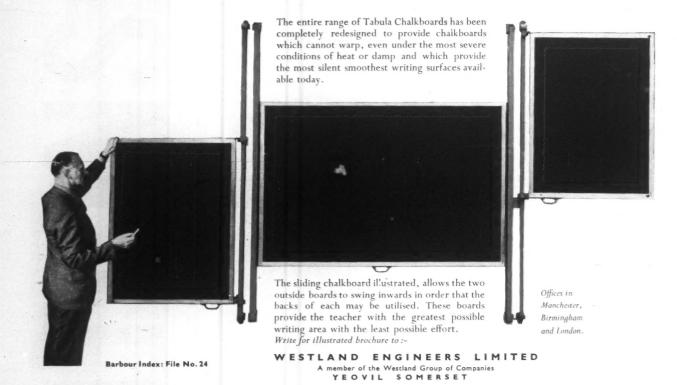
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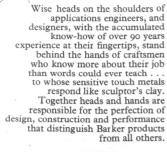


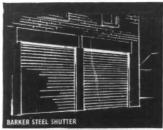


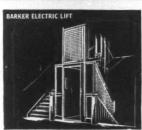
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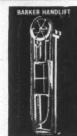












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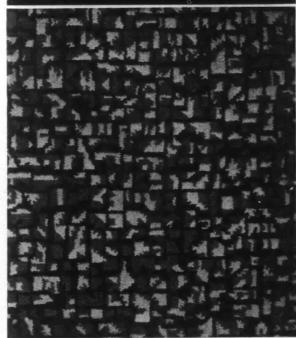
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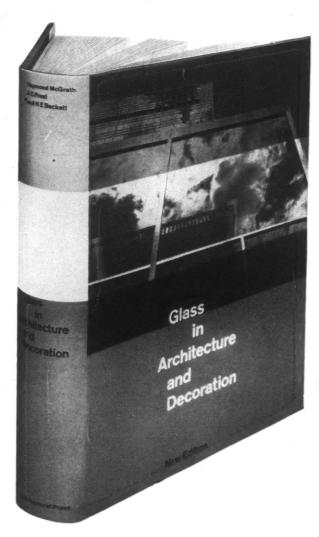
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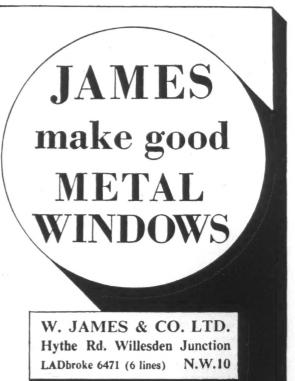
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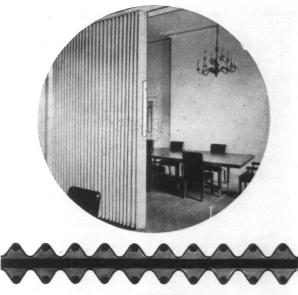
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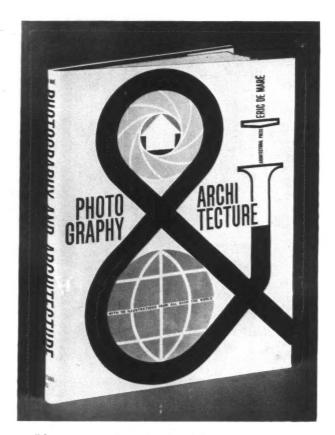
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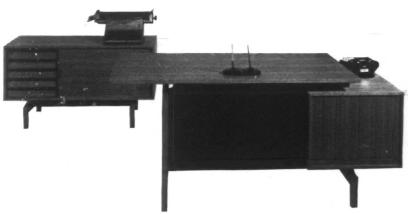
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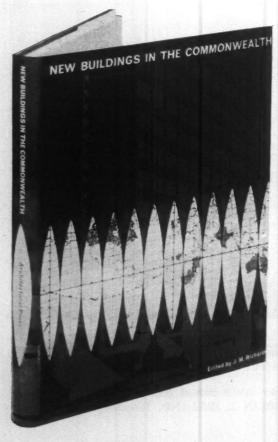
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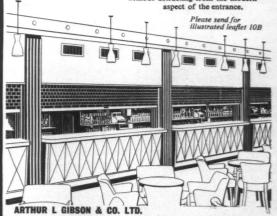
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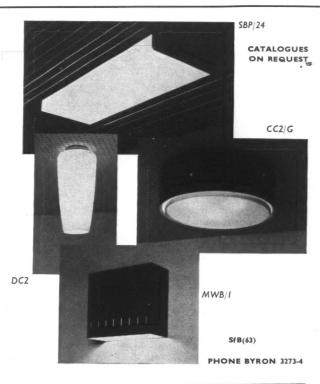
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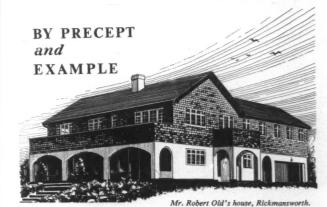
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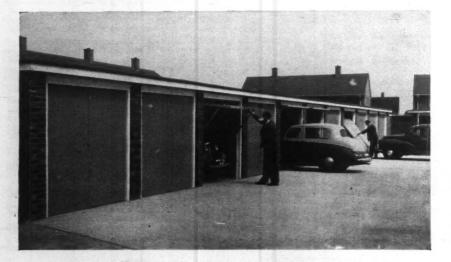
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Allom Heffer & Co. Ltd.	***	***	68
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Architectural Press Ltd.	10, 114, 1	16, 118	, 120, 122
Association of Steel Conduit	Manufact	urers	31
Austin, James, & Sons (Dews	bury) Ltd.	***	14
Barker, John, & Sons (Engine	eers) Ltd.		113
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Bow Slate & Enamel Co. Ltd.			15
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			***	4, 66
Hope, Henry, & Sons Ltd. Hotel & Catering Exhibiti The	on (Lo			4, 66 92
Hope, Henry, & Sons Ltd. Hotel & Catering Exhibiti The	on (Lo	ndon) I	.td.,	92
Hope, Henry, & Sons Ltd. Hotel & Catering Exhibiti	on (Lo	ndon) I  I. (Plas	tics)	
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Hope, Henry, & Sons Ltd. Hotel & Catering Exhibiti The	ries Ltd	ndon) I  1. (Plas 	tics)	92 20 111 115 121
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					PAGE
Pel Ltd Permanite Ltd.			***		22
Permanite Ltd.					73
Pilkington Bros. Ltd.					62, 63
Pilkington Bros. Ltd.					50
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Super Silent Ltd.					49
					4.77
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Thermalite Ytong Ltd					126
Timber Development				4 4 4	26
Troughton & Young (	Ligh	ting) L	td.		2
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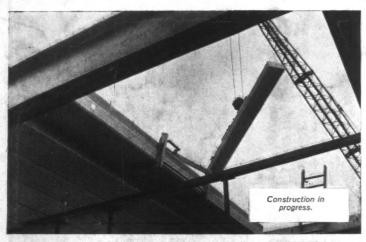
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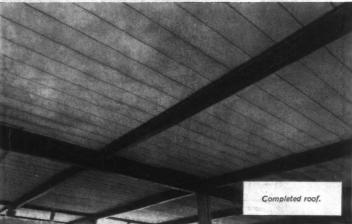
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